The Dissertation Committee for Rebecca Marie Doran Eaton certifies that this is the approved version of the following dissertation:

Unheard Minimalisms:

The Functions of the Minimalist Technique in Film Scores

Committee:

_____
Eric Drott, Supervisor

_____
Byron Almén

_____
James Buhler

_____
Edward Pearsall

_____
Charles Ramírez Berg

Unheard Minimalisms:

The Functions of the Minimalist Technique in Film Scores

by

Rebecca Marie Doran Eaton, B.A.; M.M.

Dissertation

Presented to the Faculty of the Graduate School of

The University of Texas at Austin

in Partial Fulfillment

of the Requirements

for the Degree of

Doctor of Philosophy

The University of Texas at Austin

May 2008

ACKNOWLEDGMENTS

First, I would like to thank my committee, whose insightful comments have helped me shape this work. Special recognition goes to Dr. Almén, whose copyediting expertise has kept me from committing several grammatical gaffes, and Dr. Buhler, whose approach to film music has informed my own. I owe a deep debt of gratitude to my supervisor, Dr. Eric Drott, whose keen—and always timely—critiques have steered my dissertation toward one with both breadth and analytical depth.

I would also like to thank the entire theory department at UT Austin. Its support though T.A. and A.I. positions has helped me hone my pedagogical craft, while the Kent Kennan fellowship has allowed me to finish my dissertation in a timely manner. Thanks must also be given for the collegial atmosphere—especially amongst my fellow students—which made attending UT a delight.

My family, of course, has been the basis for my success. I am blessed to be part of a completely overeducated family of academics: our graduate degrees or professional licensures include ones in botany, art education, marriage and family therapy, hypnosis, information technology, reading, music composition, and now music theory. They have encouraged my intellectual curiosity, instilled a strong work ethic, and have always provided unwavering support. I cannot thank them enough.

Thanks are also offered to my best friend, Craig. He has made what could have been the two most stressful years of my life into a joy.

Unheard Minimalisms:

The Functions of the Minimalist Technique in Film Scores

Publication No. _____

Rebecca Marie Doran Eaton, Ph.D.

The University of Texas at Austin, 2008

Supervisor: Eric Drott

Minimalist music has now become ubiquitous in film, found in everything from PBS advertisements to big-budget studio movies like *A Beautiful Mind*. This presents a number of questions: what kind of films use the technique, how does its deployment compare to the classical Hollywood score, and how does it function? This dissertation is intended to address these issues by examining what minimalism has come to mean in films that have become part of popular culture. I detail how the musical technique intersects with the model of the classical Hollywood film score, and, by exploring the film music of Steve Reich, Terry Riley, Philip Glass, Michael Nyman, and "non-minimalist" composers, give a history of minimalism's use on the score from its avant-

garde origins in the 1960s to its commercial appropriations in the 1990s and 2000s. Utilizing Nicholas Cook's idea of "enabling similarity" from his book *Analysing Musical Multimedia* and Rebecca Leydon's minimalist tropes from her *Music Theory Online* article "Toward a Typology of Musical Tropes," I provide detailed analyses of ten films employing minimalist techniques (*Koyaanisqatsi*, *The Terminator*, *A.I.: Artificial Intelligence*, *Solaris*, *Kundun*, *A Beautiful Mind*, *Proof*, *The Truman Show*, *Gattaca*, and *The Thin Blue Line*), showing how musical meaning in these films is tied to minimalism's particular stylistic attributes. Through the repeated linkage of minimalism with the Other, the mathematical mind, and dystopia, these meanings have the possibility—like the socially-encoded meanings of the classical score—of becoming enculturated.

TABLE OF CONTENTS

LIST OF EXAMPLES

INTRODUCTION

To date, there have been more than a hundred films that employ minimalist musical techniques in their scores. And they no longer occur simply in avant-garde or documentary films, but have become part of the mass market, appearing in mainstream and blockbuster features. As Edward Strickland asserts on the first page of his book *Minimalism: Origins*, minimalist music "has become a major influence on television and Hollywood."[1] It is not that these minimalist scores are "unheard" as per Gorbman's famous formulation; indeed, some critics complain that they are far too obvious, breaking "with the 'film music should be unobtrusive' credo."[2] Instead, they can perhaps be better described as relatively unexplored in the scholarly literature.[3]

Given minimalism's current ubiquity in the media, and its proclaimed high status as "the most protean, popular, and culturally significant music to arise within the last half century of what Richard Crawford has called the "cultivated" tradition of American music," it seems odd that there exists no prior book-length scholarly study devoted to the employment of minimalist music in film.[4] Academic musicological work on minimalism has largely ignored its use in film scores, instead concentrating on works composed for the concert hall. Much film music scholarship has focused on the classical Hollywood

1 Edward Strickland, *Minimalism: Origins* (Bloomington: Indiana University Press, 1993), 1.

2 "*FilmMaker* Selects 20 Essential Movie Soundtracks," *Filmmaker: The Magazine of Independent Film*, http://www.filmmakermagazine.com/winter2006/line_items/permanent_rotation.php (accessed 10 Feb 2007).

3 "Unexplored Minimalisms," however, would not make as interesting a title, tying this dissertation to Gorbman's groundbreaking *Unheard Melodies*. Both of our studies aim to explain how music functions in film. Claudia Gorbman, *Unheard Melodies: Narrative Film Music* (Bloomington: University of Indiana Press, 1987).

4 Robert Fink, *Repeating Ourselves: American Minimal Music as Cultural Practice* (Berkeley: University of California Press, 2005), xi.

score, which conventionally employs a late Romantic idiom; more recently, academics have also addressed popular music scores and those of films outside the dominant Hollywood style, but—except for a few recent articles—have left minimalist scores untouched. This gap leaves unanswered a number of questions. In what kinds of films is minimalism used? Does it have the same function and meanings as music in more conventional film scores, and if not, how is one to analyze it?

This dissertation is intended to begin to remedy the lacuna in scholarship by examining what minimalism has come to mean in films that have become (or were intended to be) part of popular culture. This study will lay the groundwork for future studies by showing how the musical technique intersects with the model of the classical Hollywood film score, by providing a history of minimalism's use as film music from its origins in the 1960s to the 2000s, and by examining how minimalist techniques function in selected films. Chapter One provides the basic concepts and models for this study, examining the discourse on minimalism and film, detailing what minimalism is, how music has traditionally functioned in film scores, and how the minimalist technique interacts with this model. This examination leads to a method for the analysis of the meaning of minimalist music in film based on the work of Nicholas Cook and Rebecca Leydon. Chapter Two offers a history of the minimalist technique as it has been used in film scores; by tracing the work of major minimalist composers, it shows a progression from use in avant-garde film to its incorporation into the mass market. It also details how minimalist techniques have recently crept into the scores of "non-minimalist" composers, and suggests possible reasons for this development. Chapters Three through Seven

present analytical case studies, where the method developed in Chapter One is employed through close readings of scores in order to explicate some of the meanings minimalism has acquired in films that have reached a mainstream audience. By addressing these issues, this dissertation intends to benefit both film music studies and musicology, broadening the discourse of minimalist music studies to include music composed for film, and providing to film musicology a method for approaching minimalist scores.[5]

This study, though it discusses the origins of minimalist film scores in avant-garde film, concentrates its analysis on films that have reached—or were intended to reach—popular culture. In this respect, my approach is similar to that of Robert Fink in *Repeating Ourselves: Minimalism as Cultural Practice*. Fink attempts to find a meaning in minimalism by relating it to consumer culture practices—saying that minimalist repetition, for instance, is like the repetition of commercials intended to create a desire for an object. Where Fink finds meaning by relation or metaphor to cultural practice, I am interested in finding the meaning(s) in minimalism as it is used in a mass-market cultural product. I attempt to find not potential meanings, but meanings that have been socially constructed. Through the analysis of films that have reached a mainstream audience, I hope to discover meanings that, like the meanings of the classical Hollywood score, possess the potential to become enculturated.

[5] As this dissertation is an interdisciplinary study, I have included some footnotes (several in Section 1.2) intended for those interested in my topic but who are not well versed in music theory or history.

CHAPTER ONE
MINIMALISM AND FILM: CONCEPTS AND MODELS

1.1 Examination of the Discourse

The lack of prior study on minimalism in film should perhaps not be so surprising, given the state of research in the disciplines of both minimalism and film music. Both remain young disciplines—though books and articles have increased exponentially in the past few years—and rarely does one area of study mention the other. But though information on this dissertation's specific topic is rare, scholarship from both areas helps create a frame for discussion. Studies on minimalism describe its musical characteristics, and also occasionally give data on its inclusion in specific films; film music publications also occasionally give relevant detail on films employing minimalist techniques, and describe how music is traditionally used in film. By combining this information, one can define minimalism, explain the dominant ideology of the classical Hollywood film score, and then explicate how these may interact.

As author and composer Kyle Gann has noted, "the bibliography of minimalism is, appropriately, minimal."[1] There are only a handful of published book-length monographs on the subject, and none delve into its use as film music in depth. Wim Merten's slim volume *American Minimal Music*, originally in Flemish, is the earliest of such studies.[2] First published in 1980, it preceded the flood of minimalist film scores of

1 Kyle Gann, "Minimal Music, Maximal Impact: Minimalism Bibliography," NewMusicBox, 1 Nov 2001, http://www.newmusicbox.org/page.nmbx?id=31tp08 (accessed 9 Jan 2007).

2 Wim Mertens, *American Minimal Music: La Monte Young, Terry Riley, Steve Reich, Philip Glass*,

the 1980s, and only briefly mentions historical data on three films with minimalist scores that antedate its publication: Riley's 1969 *Music with Balls*, Reich's 1964 *Plastic Haircut*, and Glass's 1977 *North Star: Mark di Suvero.*[3] Keith Potter's more recent *Four Musical Minimalists* (2000) likewise limits its coverage—not by date of publication but by intended scope—primarily from minimalism's origins to the mid-1970s. It only briefly mentions a few facts about Riley's *Music with Balls* (1969), *Les yeux fermés* (1972), and *Lifespan* (1974); Reich's *O Dem Watermelons* (1965); and Philip Glass's *North Star* (1977).[4] While its detail is limited and it does not address the meaning or function of the music in these scores, Potter's coverage is notable in that it draws comparisons between the music of Riley and Reich's film scores and their concert music.

Edward Strickland's *Minimalism: Origins*, concerned with the early development of the movement in art, music, sculpture, and film, also limits its minimalism-as-film-music discussion to early works, Reich's *O Dem Watermelons* and *The Plastic Haircut.*[5] It is, however, one of the rare works to note minimalism's recent surge of popularity in film: "Over the past decade or so it [minimalism] has become a major influence on television and Hollywood film scores."[6] K. Robert Schwartz's *Minimalists*, covering minimalist music from its origins until its publication date (1996) is more inclusive; like Strickland, it cites Reich's early works, but also includes a short discussion of Glass's

---

trans. J(.) Hautekiet (London: Kahn & Averill; New York: Alexander Broude, 1983); Max Paddison, review of *American Minimal Music*, by Wim Mertens, *Tempo* New Ser. 148 (Mar 1984): 49-50.

3 Mertens, *American Minimal Music*, 9, 48, 83.

4 Keith Potter, *Four Musical Minimalists: La Monte Young, Terry Riley, Steve Reich, Philip Glass* (New York: Cambridge University Press, 2000), 135, 170, 251.

5 Strickland, *Minimalism: Origins*, 184.

6 Strickland, *Minimalism: Origins,* 1.

works with Godfrey Reggio, particularly *Koyaanisqatsi* (1983).[7] In one sentence, he briefly reports that the music captures "both the calm of nature and the ferocity of technology run amok," but does not detail how the music accomplishes this. Schwarz also gives a few paragraphs to the film work of Michael Nyman, mentioning the Greenaway collaborations as well as *The Piano* (1992); again, his discussion of the meaning of the score is limited, only remarking that Nyman's lyricism captures the protagonist's "smoldering passions."[8]

Robert Fink's recent *Repeating Ourselves: American Minimal Music as Cultural Practice* (2005) is not a survey in the vein of the above, but is still interested in the origins of minimalism; Fink ties the repetitive subgenre of minimalism to the repetition of postwar mass consumerism. Fink discusses minimalism's relation to television, but as a metaphor, not discussing minimalist music's use as a score to commercials, television shows, or film. As such, he only briefly—though with insight—mentions Glass's *Koyaanisqatsi*.[9] He describes how its section "The Grid" might be interpreted as a critique of consumer culture through its "visual puns," i.e., cutting between similar human and technological images. But though he mentions Glass's music, he does not intimately connect the score to his visual interpretation; this relationship will be studied within this dissertation (see Chapter Three). *Repeating Ourselves* intersects with this study in another way; Fink says that minimalism, because of its unusual teleology, is

7 K. Robert Schwarz, *Minimalists* (London: Phaidon Press Limited, 1996), 58, 151-154.
8 Schwarz, *Minimalists*, 200-203.
9 Fink, *Repeating Ourselves*, 161-65.

"constantly imagined as the music of machines, androids, and cyborgs."[10] This statement does not necessarily refer to film, but it does tie specific musical characteristics to cultural referents. Chapter Three of this dissertation investigates how this statement may—or may not—work when analyzing minimalist scores for meaning.

Besides the surveys of minimalism, a few books have been written by or about individual minimalists. Steve Reich's *Writings about Music* (1974), while offering insights into his aesthetic, mentions nothing of his film career.[11] A 2002 expanded collection, *Writings on Music: 1965-2000*, includes in its editorial introduction paragraphs on both *The Plastic Haircut* and *O Dem Watermelons* that give some data on how the music was constructed, and Michael Nyman's 1970 interview of Reich reprinted in this edition also mentions *The Plastic Haircut*.[12] *Writings on Music* also contains several interviews with Reich and his wife Beryl Korot about their video operas, *The Cave* and *Three Tales*.[13] Glass's *Music by Philip Glass* allows little more than a page describing his collaborative experiences with the directors when making *Koyaanisqatsi* and *Mishima* (1985).[14] The compilation *Writings on Glass* is an anomaly, containing an entire chapter on Glass and film, a 1990 interview with the composer on *Koyaanisqatsi* (with some mention of *Mishima*) by Charles Merrell Berg.[15] Michael Nyman, as of

---

10 Fink, *ibid*., 45.
11 Steve Reich, *Writings about Music*, ed. Kaspar Koenig (Halifax: Nova Scotia College of Art and Design/New York: New York University Press, 1974).
12 Steve Reich, *Writings on Music: 1965-2000*, ed. Paul Hillier (New York: Oxford University Press, 2002), 10, 15, 53.
13 *Ibid*., 168-180, 204-208.
14 Philip Glass, *Music by Philip Glass* (New York: Dunvagen Music Publishers, 1987), 203-4.
15 Philip Glass, "Philip Glass on Composing for Film and Other Forms: The Case of *Koyaanisqatsi* (1990)," interview with Charles Merrell Berg, in *Writings on Glass: Essays, Interviews, Criticism*, ed. Richard Kostelanetz (New York: Schirmer Books, 1997): 131-151.

September 2007, is the most recent minimalist composer to be examined in a scholarly monograph, with perhaps the greatest concentration of information on film music minimalism available in extant published scholarly literature. Pwyll ap Siôn's *The Music of Michael Nyman: Texts, Contexts and Intertexts* devotes two entire chapters to his scores, one on his collaborations with Peter Greenaway, one on his music for *The Piano*; the author also mentions in passing data on a number of other films, including *Carrington* and *Gattaca*.[16] But while this work is valuable as the only scholarly source on Nyman in English, it is of limited assistance for describing the meaning of minimalism in film because Siôn's focus is not a close reading of film/music interrelations, but instead traces Nyman's intertextualities—his borrowings from other composers as well as from himself.[17]

Like monographs, music journal articles likewise have a paucity of information about minimalism as film music, instead concentrating on defining minimalism, putting it in historical context, or analyzing minimalist works in a formalist manner.[18] Timothy A. Johnston's "Minimalism: Aesthetic, Style, or Technique" is one such article that defines minimalism; its definition will be employed in section 1.3 to delineate what "minimalism" means for the purpose of this dissertation. Another article on minimalism

16 Pwyll ap Siôn, *The Music of Michael Nyman: Texts, Contexts and Intertexts* (Aldershot: Ashgate Publishing, 2007), 79, 103, 112.

17 *Ibid*., xviii.

18 Elaine Broad's article "A New X? An Examination of the Aesthetic Foundations of Early Minimalism" both defines minimalism and looks at its origins; an example of an analysis is Richard Cohn's "Transpositional Combination of Beat Class Sets in Steve Reich's Phase-shifting Music." Timothy A. Johnson, "Minimalism: Aesthetic, Style, or Technique?" *The Musical Quarterly* 78, issue 4 (Winter 1994): 742-773; Elaine Broad, ""A New X? An Examination of the Aesthetic Foundations of Early Minimalism," *Music Research Forum* 5 (1990): 51-62; Richard L. Cohn "Transpositional Combination of Beat Class Sets in Steve Reich's Phase-shifting Music." *Perspectives of New Music* 30, no. 2 (Summer 1992): 146-177.

that does not mention film, but whose material may be productively applied to it, is Rebecca Leydon's "Toward a Typology of Minimalist Tropes," which will be discussed in detail later in this chapter.[19] Leydon develops several meanings or affects that minimalism's repetition can project, such as "totalitarian" and "motoric." While referring to concert works, these tropes hold promise for the interpretation of minimalist music in film.

Film music, which enjoys a half century more history than does minimalism, has received more scholarly attention; however, much of the academic work done in the field has appeared in the wake of Claudia Gorbman's groundbreaking text *Unheard Melodies: Narrative Film Music* (1987).[20] Though the scholarship in the field has multiplied in the past twenty years, it rarely touches upon the role of minimalist music in film.[21] Among theoretical studies that postdate the development of minimalism, neither Gorbman's *Unheard Melodies,* Kalinak's *Settling the Score,* nor Caryl Flynn's *Strains of Utopia* mention the musical style or its composers, instead concentrating primarily on film scores of the "Classical Hollywood" style.[22] But their work—especially that of Gorbman—proves useful for a study of minimalist film scores. Gorbman develops a model of the

---

19 Rebecca Leydon, "Toward a Typology of Minimalist Tropes," *Music Theory Online* 8, no. 4 (Dec 2002) http://mto.societymusictheory.org/issues/mto.02.8.4/toc.8.4.html (accessed 10 Jan 2007).

20 Claudia Gorbman, *Unheard Melodies*, *ibid*; David Neumeyer with Caryl Flinn and James Buhler, "Introduction," in *Music and Cinema*, ed. James Buhler, Caryl Flinn, and David Neumeyer (Hanover: Wesleyan/University Press of New England, 2000), 2.

21 For a more complete discussion of the state of film music research, see Robynn J. Stilwell, "Music in Films: A Critical Review of the Literature, 1980-1996," *The Journal of Film Music* 1, no. 1 (2002): 19-61; Claudia Gorbman, "The State of Film Music Criticism," *Cineaste* 21, no. 1-2 (Feb 1995): 72-5.

22 Kathryn Kalinak, *Settling the Score: Music and the Classical Hollywood Film* (Madison: The University of Wisconsin Press, 1992); Claudia Gorbman, *Unheard Melodies*, *ibid.*; Caryl Flinn, *Strains of Utopia: Gender, Nostalgia, and Hollywood Film Music* (Princeton: Princeton University Press, 1992).

classical Hollywood score, against which minimalist scores can be fruitfully compared. Royal S. Brown's more general study *Overtones and Undertones* wanders outside the classical Hollywood style, and includes a few lines on Glass's Reggio collaborations, *Mishima*, and *The Thin Blue Line*. It also includes a page on Michael Nyman, which traces some of his musical borrowings and also hints at how Nyman's music contributes to the structure of Greenaway's films.[23]

Of books that focus on the history of film music, Prendergast's *Film Music: A Neglected Art* neglects minimalism.[24] Russell Lack's incredibly detailed *Twenty-Four Frames Under: A Buried History of Film Music*, by contrast, includes a paragraph on *The Thin Blue Line* (1986, music by Glass) and more than a page on Michael Nyman.[25] While useful for historical reference, the value of this information is tempered by the imprecise language (such as "heraldic statements" or "melancholic feel") of an author who comes to film music from the film production side, not as a musical specialist.[26] There is one film music dissertation on Nyman's work, Florence Millard Daugherty's "Narrative and Nonnarrative Structures in the Film Music of Michael Nyman," but it lacks rigor in dealing with the minimalist aspect of his music.[27] There are also a few

---

23 Royal S. Brown, *Overtones and Undertones: Reading Film Music* (Berkeley and L.A.: University of California Press, 1994), 180-182.

24 Roy M. Prendergast, *Film Music: A Neglected Art,* 2nd ed. (New York: Norton, 1992).

25 Russell Lack, *Twenty-Four Frames Under: A Buried History of Film Music* (London: Quartet Books, 1997), 261-2, 338-40.

26 The information is also tempered by a few inaccuracies, in particular the genesis of the *Carrington* music. Lack says it was "composed after the film was completed," while other sources note that it was derived from his previously composed *String Quartet No. 3*. Sleeve Notes, *Out of the Ruins*, Silva Screen FILMCD 063 (1989); "London's Nyman scores with his new `Carrington'," *Billboard* 107, no. 34, 26 Aug 1995, p. 10-11.

27 It only cites one academic work on minimalism, Schwarz's *Minimalists*, never defines what minimalism is, and does not deal in a meaningful way how Nyman's minimalist music might be employed or signify

compilations on film music that draw on essays ranging from film music theory to history to analytical case studies. Neither *Music and Cinema* nor *Film Music: Critical Approaches* deal with minimalism,[28] but the recent *Beyond the Soundtrack: Representing Music in Cinema* (2007) proves a treasure trove.[29] Amongst its essays are one by Michel Chion that addresses *The Piano*, a chapter by Mitchell Morris on myth-making in *Koyaanisqasi*, and an essay by Susan McClary on three films with minimalist scores: *The Hours*, *Angels and Insects*, and *The Piano*. McClary's essay proves especially rich in helping establish a model for analyzing scores employing minimalist techniques, and will be discussed in detail later in this chapter.

Besides academic research on film music, there are also a number of books, magazines, and websites oriented toward an audience of film music fans, rather than academics. Some information on minimalism and film can be gleaned from *Film Music*, a book of interviews of film composers including Glass and Nyman.[30] One of the best resources for information on film music minimalism is *Film Score Monthly*, whose authors were some of the first write about minimalist film scores.[31] Besides articles on minimalist composers such as Michael Nyman, the website also culls film reviews in newspapers for any mention of the scores; thus, one can find (of the very few film

---

differently than any other film music. Florence Anne Millard Daugherty, "Narrative and Nonnarrative Structures in the Film Music of Michael Nyman" (Ph.D. diss., Florida State University, 1997).

28 K.J. Donnelly, ed., *Film Music: Critical Approaches* (New York: Continuum International Publishing Group, 2001); James Buhler, Caryl Flinn, and David Neumeyer , eds, *Music and Cinema*, ed. (Hanover: Wesleyan/University Press of New England, 2000).

29 Daniel Goldmark, Lawrence Kramer, and Richard Leppert, eds., *Beyond the Soundtrack: Representing Music in Cinema* (Berkeley and Los Angeles: University of California Press, 2007).

30 Mark Russell and James Young, eds, *Film Music*, Screencraft (Boston: Focal Press, 2000).

31 *Film Score Monthly,* http://www.filmscoremonthly.com/, http://www.screenarchives.com/fsmonline/main.cfm (accessed 11 Jan 2007).

reviews which mention music at all) those that mention minimalist music.[32] Because of the extremely limited resources relating to minimalist film music, books and journal articles on film, interviews with composers and directors, film reviews in both the academic and popular press, film databases, DVD and score recording liner notes, film festival program notes, selected websites, and the films themselves have all been gleaned for relevant information.[33]

So why, if there are growing academic works on both minimalism and film music, are there so few resources examining the role of minimalist music in film? One might speculate that its use on the soundtrack is a relatively recent phenomenon, only reaching a wider audience since the 1980s; academic scholarship on a topic often lags by decades. While academic work takes time to coalesce, popular culture critics react more quickly; thus, fan magazines like *Film Music Monthly* have more to say about film music minimalism than do academic works.[34] Another issue regarding the lack of film music scholarship addressing minimalism is that the majority of film music studies deal with "classical Hollywood" scores,[35] which excludes from the outset minimalist scores.[36]

---

32 "Michael's Minimalism, pt. 1," *Film Score Monthly* Online 11, no. 11, http://www.screenarchives.com/fsmonline/main.cfm; "Michael's Minimalism, pt. 2," *Film Score Monthly* Online 11, no. 12, http://www.screenarchives.com/fsmonline/main.cfm; Scott Bettencourt, "Did They Mention the Music 2006," Film Score Daily, *Film Score* Monthly, http://www.filmscoremonthly.com/articles/2007/03_Jan---Did_They_Mention_The_Music.asp (accessed 11 Jan 2007).

33 The reliability of the information found on websites is often in question. Composers' own official websites were deemed reliable, as were program notes from film festivals and film archives (like Canyon Cinema). For other sources, every effort was made to cross-check data with reliable sources.

34 The fairly recent origin of this phenomenon—along with the resulting copyright issues—is perhaps the most likely reason this topic has not been studied before in detail.

35 Stilwell, "Music in Films," 46.

36 Recently more studies have appeared which examine film/music relations out of the typical "classical Hollywood" style, including Annette Davidson, *Hollywood Theory, Non-Hollywood Practice: Cinema*

Another possible reason for the lack of scholarship in the area is the odd position of the most prolific minimalist film composers, Nyman and Glass, with the academic establishment. Minimalism began outside of academe as a reaction against the accepted academic musical style; as such, it was initially looked down upon and to some degree still has a stigma. Glass, though he gained some respect in the art music world in the late 1970s and 1980s for such works as *Einstein on the Beach*, is seen by some as being complicit in his music's commercialization—having "sold out" to popular culture—while Nyman, because he began his composition career in film, has had difficulty gaining respect in the classical music establishment.[37] Though recently the study of mass-market musics is becoming more accepted in musicology, it is perhaps the case that minimalist film music falls into a gap between what popular musicology and "art" music studies consider their areas—too "highbrow" for the popular musicologists, too mass-market for classical music scholars. Many academics have lingering anxiety over the high culture/popular culture divide, and are invested in the valuation of high culture products over those of popular culture. It is possible that scholars consider the inclusion of minimalism in mass-market products as a debasement of that music; as Herbert J. Gans declares in *Popular Culture and High Culture: An Analysis and Evaluation of Taste*, "When an item of high culture is borrowed... the high culture public may thereafter consider it tainted because its use by the popular culture has lowered its cultural

---

Soundtracks in the 1980s and 1990s (Burlington: Ashgate Publishing Company, 2004).

37 Schwarz, *Minimalists*, 166-8, 203; John Rockwell, "Recordings View; A Composer Craves Respect," *New York Times*, 15 Mar 1992, Section 2.

prestige."[38] Perhaps because they believe it debased, they choose not to study its mass-market products. The work of Edward Strickland, *Minimalism: Origins*, in particular, seems to be a reflection of this academic anxiety over minimalism's appropriation by mass culture. On the first few pages, he acknowledges its influence on popular culture; then, he spends the rest of the book attempting to "rescue" its status as avant-garde by recounting its roots as what Bourdieu would call an "autonomous" artwork, one with little audience and little profit but high intellectual capital.[39] A continuing preference for the study of works with higher cultural status is revealed in academia by an examination of what films scholars choose to study when they do examine films with minimalist scores. Pwyll ap Siôn, in his monograph on Nyman, examines the composer's Greenaway collaborations and *The Piano*. The essays found in *Beyond the Soundtrack* focus on *Koyaanisqatsi*, *The Piano*, and *The Hours*. All these films are either avant-garde, or in the case of *The Hours* and *The Piano*, were seen by a wide audience but are accorded a higher cultural status because of their complicated, adult themes.

Whatever the reason for the lacuna in scholarship, this study aims to fill the gap. This dissertation takes as a given minimalism's trajectory from avant-garde music to its inclusion in mass-culture products, but attempts to refrain from any value judgments on its change in cultural status. Instead, it embraces this trajectory and focuses how this music functions in more mainstream film. But any explication of its meanings—since they are closely tied to its musical characteristics—must be predicated by a description of

38 Herbert J. Gans, *Popular Culture and High Culture: An Analysis and Evaluation of Taste*, Revised and Updated Edition (New York: Basic Books, 1999), 39.

39 Pierre Bourdieu, *The Field of Cultural Production: Essays on Art and Literature*, ed. Randal Johnson (New York: Columbia University Press, 1993), 49.

what minimalism is.

1.2 A Very Short History of Minimalism

Musical minimalism,[40] like most artistic movements, developed both as a reaction against—but also grew out of—previous styles.[41] Though some note precedents like Satie's *Vexations* (1893) or Ravel's *Bolero*,[42] the first minimalist piece is generally considered to be La Monte Young's *Trio for Strings* of 1958.[43] Influenced by the drone sounds of his youth (such as those from electric transformers) and Webern's sparse

40 While I will be referring to compositions as early as 1958 as minimalist, the term minimalism originally applied to a movement in the visual arts. It was not applied to music until either 1968 or 1972, according to the opposing claims of British critic Michael Nyman and *Village Voice* critic Tom Johnson, and gained popularity by the later 1970s. One should also note that the composers referred to as minimalists dislike the term. Potter, *Four Musical Minimalists*, 1-3; Keith Potter, "Minimalism," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 18 Jan 2007).

41 The ascendant style of the academy in the 1950s was serialism. As opposed to the major/minor tonal system, where tonality governs works (i.e. pieces are in keys like C Major and may move temporarily to other keys), in serialism, there is a fixed series of musical elements whose ordering governs the composition. Schoenberg began the style in the 1920s with serialized pitches. He arranged the 12 notes of the equal tempered scale into a row that would reappear in different permutations throughout a composition (this typically generates atonal works). In the 1950s, a branch of serialism called "integral" or "total serialism" gained popularity in the academy through the works of composers such as Boulez and Babbitt. In total serialism, not only pitches, but durations, dynamics, and even timbres can be governed by a series. The serial process/elements used to compose pieces is quite difficult (if not impossible) to hear during performance, approaching the sound of the aleatoric (chance) works of Cage. Pieces using the total serialism method of composition are generally quite dissonant, have no discernable pulse, and rarely have any sense of (discernable) repetition. Minimalism—at least for Steve Reich--was not only a reaction against serialism but also against Cageian experimentalism. In his 1968 manifesto "Music as a Gradual Process," Reich complains that Cage's musical processes (as well as those of most serial works) could not be heard. Reich instead wanted an audible process, where "compositional process and a sounding music ... are one and the same thing." Paul Griffiths, "Serialism," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 17 Jan 2007); Steve Reich, "Music as a Gradual Process," in Steve Reich, *Writings on Music: 1965-2000*, ed. Paul Hillier (New York: Oxford University Press, 2002), 35.

42 *Vexations* is a short series of chords repeated 840 times. *Bolero* (1928, ballet) has a long-line melody repeated with different orchestrations. Robert Orledge, 'Satie, Erik', *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007); Schwarz, *Minimalists*, 10; Strickland, *Minimalism: Origins*, 124.

43 Potter, *Four Musical Minimalists*, 29, 34; Schwarz, *Minimalists*, 23.

textures, Young wrote this static work made up entirely of long sustained tones and rests—the first pitch lasts more than four minutes.[44] While this composition "of minimal means" is quite removed from the total serialism of academic composers of the time such as Babbitt, the work actually employs serial technique in its pitch content.[45] While such serial holdovers would soon be expunged, the work contains what would become two hallmarks of early minimalism: "economy of material" and static harmony.[46] The *Trio* was not well received by Young's teacher at UC Berkeley or his fellow students, who thought him "off the deep end."[47]

While Young might not have received support from those who originally heard his *Trio*, he soon met a student who would become both supporter and compatriot in the fledgling minimalist movement, Terry Riley.[48] Influenced by Young's long-tone style, Riley composed his 1960 *String Quartet*.[49] The following year (1961), Riley composed a *String Trio* that would introduce two new minimalist traits: short phrase repetition and modal (not serial) pitch material.[50] This work, the first notated minimalist repetition, was

---

44 Strickland, *Minimalism: Origins*, 127; Potter, *Four Musical Minimalists*, 34.

45 Strickland, *Minimalism: Origins*, 120.

46 Potter, *Four Musical Minimalists*, 29; Potter, "Minimalism," *ibid*.

47 After the *Trio*, Young moved into conceptual art following his Darmstadt introduction to the music of the experimentalist composer Cage. An example is his 1960 *Poem*, in which performers drag furniture across a floor—again, long sustained sounds. After he moved to New York, Young formed the Theatre of Eternal Music. Their performances, including the famous Tortoise works, include drones ranging from a pet turtle's aquarium motor to a sine-wave oscillator. Potter, *Four Musical Minimalists*, 42-73; Edward Strickland, "Young, La Monte," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007).

48 Potter, *Four Musical Minimalists*, 42.

49 Edward Strickland, "Riley, Terry," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007); Strickland, *Minimalism: Origins*, 133, 143.

50 Young asserts that he was the first to introduce repetitive elements into minimalism, with his *arabic numeral (any integer) to Henry Flynt* (1960). In this work, the performer makes a loud percussive sound as many times as she chooses. It is up for debate whether this work rightfully belongs under the

influenced by the repetition of Riley's tape experiments, such as tape loop in *M (Mescalin) Mix* (1961). Riley continued experiments with repetition in *Music for 'The Gift'* (1963), a tape work based on Chet Baker's band playing "So What," originally from Miles Davis's *Kind of Blue*.[51] Minimalism finally took a step out of the underground avant-garde scene and into public consciousness with Riley's 1964 *In C.* Often described as the first minimalist masterpiece, the modal work is composed of 53 phrases, which each performer of the group may play any number of times before going on to the next phrase. This results in an indeterminate, complex texture built up from small, simple repeated modules.[52] The modular repetition, the constant pulse of the work (aided by one performer keeping pulse on the high C's on the piano), and the undeniable modal nature of *In C*—characteristics of minimalism to follow—marked out a style far more accessible than that of academic serialism. The 1964 premiere of *In C* led to a glowing review in the *San Francisco Chronicle*, bringing the style its first public recognition, and a 1968 Columbia Records release of the work on LP brought minimalism to a mainstream audience.[53]

---

developing minimalist movement or under the umbrella of conceptual art/Fluxus/Cageian performance art. Edward Strickland, "Riley, Terry," *ibid*.; Edward Strickland, "Young, La Monte," *ibid*.; Potter, *Four Musical Minimalists*, 98-9; Schwarz, *Minimalists*, 33-4; Strickland, *Minimalism: Origins*, 143-5.

51 Potter, *Four Musical Minimalists*, 106-7.

52 Edward Strickland, "Riley, Terry," *ibid*.

53 After *In C*, Riley moved to New York in 1965 and spent a year performing with Young's Theatre of Eternal Music. He also continued improvising and experimenting with tape, using loops and a time-lag accumulator (a device that produces a variable-length artificial echo). Experiments culminated with *Poppy Nogood and the Phantom Band* (1967). In this work, which could be performed solo in public, Riley would play somewhat-improvised repeated modules into a microphone hooked up to two tape recorders. The recorders would employ the time-lag process to turn his solo soprano sax (over electric organ drone) into a canonic, layered texture. His next piece, *A Rainbow in Curved Air* (1968) employed similar techniques to the keyboard. During the 1970s Riley concentrated on Indian music and improvisation, though he did write film scores. Since the 1980s he has returned to notated composition,

One of the performers of *In C*'s 1964 premiere was Steve Reich.[54] Reich had already been working with tape, and, influenced both by Riley's tape compositions as well as *In C,* Reich wanted to find his own way of using repetition.[55] He came upon it in a fortuitous discovery; he made two tape loops of an African-American preacher, put them on different tape recorders, and noticed that because of the differences in the recorders, the loops would gradually move out of phase (or out of synch) with each other.[56] This phasing process was seamless, easily audible, and much more rigorous than the improvisatory flow of Riley's work.[57] Beginning with *It's Gonna Rain* (1965, the tape work that spurred the discovery), Reich would continue to explore phasing, first with tape, then with live instruments, as in *Piano Phase* (1967).[58] Phasing would continue to be his primary technique through 1971's *Drumming*. The audible process—whether phasing or some other process—became a hallmark of Reich's early style, as he declared in his manifesto, "Music as a Gradual Process."[59]

Like Reich, Philip Glass was also interested not in the improvisatory style of Riley and Young but in using rigorous processes in composition.[60] Glass, a former Juilliard colleague of Reich's, had become reacquainted with the composer after hearing

---

but sources rarely discuss the more recent work in detail. Schwarz, *Minimalists*, 43-48; Strickland, "Riley, Terry," *ibid*.; Keith Potter, *Four Musical Minimalists*, 116-7, 129, 148; Mertens, *American Minimal Music*, 44.

54 Potter, *Four Musical Minimalists*,108-9.

55 Schwarz, *Minimalists*, 60.

56 Schwarz, *Minimalists*, 61; Mertens, *American Minimal Music*, 48.

57 Schwarz, *ibid*.; Potter, *Four Musical Minimalists*, 165.

58 Schwarz, *Minimalists*, 61, 65; Paul Griffiths, "Reich, Steve," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 17 Jan 2007).

59 This audible process was a reaction against the inaudible processes of serialism and Cage's experimentalism. This essay can be found in Steve Reich, *Writings about Music*. Schwarz, *Minimalists*, 69.

60 Potter, "Minimalism," *ibid*.

his music at a 1967 concert.[61] Glass claims his interest in repetition began before he met Reich or heard his music—Glass's 1966 *String Quartet*, for example, uses modular repetition.[62] But after becoming reacquainted with Reich, the two were close until at least 1969.[63] The composers would analyze each other's works, and the two formed an ensemble to perform their compositions.[64] The ensemble eventually split in 1971 into two distinct groups, Steve Reich and Musicians and The Philip Glass Ensemble, both of which still perform.[65]

During this early period of collaboration, Reich was still exploring the phasing technique he had discovered in 1965. Glass, influenced by the Indian music he had first been exposed to when working with Ravi Shankar, developed his own minimalist repetitive process called additive rhythm.[66] In this process, first shown in a systematic fashion in *1 + 1* (or *One Plus One*, 1968), rhythmic modules are combined "in continuous, regular arithmetic progressions."[67] This repetitive process, with its rigorous rules of expansion and contraction from a basic unit, would become Glass's favored

61 Schwarz, *Minimalists*, 66.

62 They currently have a rather acrimonious relationship. Reich feels that Glass denies the extent of his influence on the development of Glass's music; Reich, on the other hand, freely acknowledges his debt to Riley, who acknowledges Young. Schwartz claims this friction may be because of Glass's stunning commercial success. Potter, *Four Musical Minimalists*, 261-3; Edward Strickland, "Glass, Philip," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 18 Jan 2007); Schwarz, *Minimalists*, 119.

63 Potter, *Four Musical Minimalists*, 197.

64 Schwarz, *Minimalists,* 6-7; Potter, *ibid.*; Strickland, "Glass, Philip."

65 Schwarz, *Minimalists*, 123; Potter, *Four Musical Minimalists*, 197.

66 Potter, *Four Musical Minimalists*, 258.

67 For example, given basic modules A and B, an example of additive process would be to go: A AB ABB ABBB. Imbedded in the idea is also a subtractive process, so it may also go ABBB ABB AB A. Potter, *Four Musical Minimalists*, 270-273.

technique through at least *Music in Twelve Parts* (1971-1974).[68] In combination with the additive process, Glass's music of the late 1960s through early 1970s used cyclic rhythmic structures, a quick, metronomic flow of notes, static harmony, diatonic pitches, and frequent unison playing. This music was usually performed amplified by the Philip Glass Ensemble, which included woodwinds, keyboards, and the occasional voice or stringed instrument.[69]

The austere music of minimalism, with its static harmony and concentration on audible additive or phasing processes began to change in the mid 1970s.[70] Glass's *Music in 12 Parts* (1971-4) and Reich's *Music for 18 Musicians* (1974-6) mark the turn away from the austere style.[71] These compositions still have a constant pulse and a great deal of repetition, but have portions that are not harmonically static, but driven forward by harmonic movement. Additive or phasing processes are used, but are not the basis of the whole of each work. Textures are denser, with occasional counterpoint; Glass even uses some chromaticism and functional harmony.[72] This change from the austere minimalism of 1958-1974 to a more harmonically driven style has led some authors to say that minimalism proper ended in the mid 1970s, while others assert a "dubiously minimal

---

68 Potter, *Four Musical Minimalists*, 272; Potter, "Minimalism," *ibid*.

69 Strickland, "Glass, Philip," *ibid*.

70 Around the same time, a number of new composers began to write minimalist music. Minimalism reached Europe through recordings and Glass and Reich's European tours of the early 1970s. Hearing (and playing) this music spurred British music critic Michael Nyman to adopt a minimalist style in works such as film scores for Peter Greenaway. Among the many other adopters of the style, Dutch composer Louis Andriessen began to write his own, particularly dissonant and abrasive, minimalist music. Schwarz, *Minimalists*, 194-200, 204-7.

71 Schwarz, *Minimalists*, 127.

72 Schwarz, *Minimalists*, 81, 127; Potter, *Four Musical Minimalists*, 231-3, 311-23; Paul Griffiths, "Reich, Steve," *ibid*.; Potter, "Minimalism," *ibid*.; Strickland, "Glass, Philip," *ibid*.; Strickland, *Minimalism: Origins*, 239.

period" until 1980.[73]

However one dates the change, what was the austere, harmonically static, pulse-driven, repetition-based, audible-process-oriented, diatonic, static-instrumentation style of minimalism had changed by 1980 to what many academic authors term "post-minimalism"—though some still refer to this style as minimalist, a "later [mannerist] stage of minimalism."[74] Jonathan Bernard gives useful criteria for identifying a postminimalist composer:

> He or she either (1) began as a minimalist and is now writing music that, however different from those beginnings, can be plausibly traced back to them; or (2) developed after minimalism's most abundant flowering, but principally in response (even if partly in opposition) to it.[75]

For example, the music of Glass and Reich may have changed, but characteristics of it can be traced back to minimalism. Glass began to concentrate on opera and film; his newer works, though containing many familiar traits of earlier works—such as repetitive arpeggios and a constant pulse—have gained a faster change rate, more expressiveness,

---

73 Minimalism ended mid-1970s: Potter, *Four Musical Minimalists*, 16; Schwarz, *Minimalists*, 77 (calls after mid-1970s "Maximalist" period). Minimalism continued to 1980: Strickland, *Minimalism: Origins*, 235; Kyle Gann, "Minimal Music, Maximal Impact, Minimalism's Immediate Legacy: Postminimalism," NewMusicBox, 1 Nov 2001, http://www.newmusicbox.org/page.nmbx?id=31tp05 (accessed 23 Jan 2007).

74 Many writers among the popular press, such as from newspapers and magazines, often still use the blanket term "minimalism" for post-1980 art music works based on pulse-driven repetition. All film critics I have read use "minimalism" for the works of Glass, Nyman, etc., post-1980. Adams is called a minimalist in the following articles: Mark Swed, "John Adams," *The Musical Times* 130, vol. 1761 (Nov 1989): 662-4; Allan Kozinn, "Review/Music; John Adams Conducts New and Old Works," *New York Times*, 31 Oct 1988, http://query.nytimes.com/gst/fullpage.html?res=940DEED91031F932A05753C1A96E948260 (accessed 26 Jan 2006); David Lynch, "Record Reviews: Box Sets: The John Adams Earbox," *The Austin Chronicle*, 17 Dec 1999, http://www.austinchronicle.com/gyrobase/Issue/review?oid=oid%3A75125 (accessed 26 Jan 2006); Brent Heisinger, "American Minimalism in the 1980s," *American Music* 7, no. 4 (Winter 1989): 446.

75 Jonathan W. Bernard, "Minimalism, Postminimalism, and the Resurgence of Tonality in Recent American Music," *American Music* 21, no. 1 (Spring 2003): 127.

and a hint of lyricism.[76] Glass's music has also acquired big dynamic build-ups, and his structures, once formed by additive processes, have been taken over by harmonic progressions.[77] Reich's music has continued to feature repetition and a steady pulse, but has also become more expressive, melodic (with a number of choral works), and more chromatic.[78]

Besides those composers like Glass and Reich who began as minimalists, other composers, influenced by minimalism, have adopted a postminimal style. Like Reich and Glass, they have taken the earlier minimal techniques of steady pulse and repetition and added more drama or dynamic expressiveness, as well as their own individual traits.[79] The first postminimal piece[80] is generally acknowledged to be William Duckworth's *Time Curve Preludes* (1978) for piano, which uses phrasal repetition, drones, the Fibonacci series as a rhythmic device, and quotations from Satie.[81] John Adams is perhaps the best-known postminimalist, recognized for synthesizing the techniques of minimalism with neo-Romantic emotionalism.[82] His *Harmonielehre* (1984-5), for example, uses both repeated motives and a Mahlerian chromatic language.[83]

---

76 Strickland, "Glass, Philip," *ibid*.
77 Bernard, "Minimalism, Postminimalism, and the Resurgence of Tonality," *ibid*.
78 Griffiths, "Reich, Steve," *ibid*.; Schwarz, *Minimalists*, 87-106.
79 My characterization of postminimalism is an amalgamation of these sources: Schwarz, *Minimalists*, 170; Kyle Gann, "Minimal Music, Maximal Impact, Minimalism's Immediate Legacy: Postminimalism," *ibid*; Brent Heisinger, "American Minimalism in the 1980s," *American Music* 7, no. 4 (Winter 1989): 444.
80 This was the first by a composer who did not begin as a minimalist.
81 Kyle Gann, "Reshaped-Note Singing," *Village Voice*, 25 Feb 1992, p. 88; Don C. Gillespie, "Duckworth, William (Irvin)," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 26 Jan 2007); Kyle Gann, "Minimal Music, Maximal Impact, Minimalism's Immediate Legacy: Postminimalism," *ibid*.
82 Schwarz, *Minimalists*, 170, 182
83 Schwarz, *Minimalists*, 182; Sarah Cahill, "Adams, John (Coolidge)," *Grove Music Online* ed. L. Macy,

1.3 Characteristics of Minimalism and Postminimalism

To be able to identify minimalist film scores, one must be able to identify their musical traits. In minimalism, elements of a piece (such as harmony or rhythm) are fixed, or change quite slowly. While they might share this one trait in common, minimalist pieces are quite diverse, not only in orchestration—including everything from tape to electronics to orchestral music—but also in terms of style. Usually some combination of the following characteristics is enough to signal to the listener that the music is minimalist, with repetition and a steady pulse tending to be the most salient. Obviously not all of these can be present in a single piece.

1) Drone: This is most characteristic of the work of La Monte Young, though it appears occasionally in Terry Riley's work (*Poppy Nogood*) and that of other minimalist composers such as Phil Niblock.
2) Diatonicicism: Though rarely "tonal" per se (i.e., it does not tonicize a particular key with harmonic progressions), minimalist music tends to be far more diatonic or modal than chromatic. Changes from one scale to another are often slow.
3) Static Harmony: Harmonies are simple and usually consonant, and harmonic change occurs quite slowly; the music may feature a limited set of chords and move only amongst them, or it may sustain one chord for some time.
4) Static Instrumentation: Composers often use a particular ensemble (such as the Philip Glass Ensemble), with all instruments playing more or less continuously.
5) Processes: Composers use techniques such as phasing or additive process as

http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 26 Jan 2007).

structural devices; these processes are easily audible in earlier works.

6) Repetition: Pieces repeat modules/motives numerous times.
7) Steady pulse: A motoric, steady beat is typically present, as is a limited rhythmic palette.
8) Lack of real melody: Only short patterns, no long Romantic, expressive melodies are used.
9) Limited expressiveness: Unlike Romantic music, an affect is maintained for the entire piece (like Baroque works), or change is slow; there is little dynamic contrast.
10) "Drawn out" or "hypnotic" sensibility: The combination of repetition, static harmony and instrumentation, length of pieces, etc., create a different sense of time or hypnotic state, where one listens for the smallest change.[84]

From the history of minimalism provided above, one can observe that what is considered minimalism began with the static and drone works of Young, was eclipsed by a steady-pulsed music based on repetition, and has developed into a postminimal style that—though it may still feature a steady pulse and repetition—includes an emphasis on harmonic motion and expressiveness.[85] Many of the films I will be discussing were released post-1980, and as a result one could label their soundtracks as "postminimal."

84 Bernard disagrees with the term "stasis" related to minimalism, though many other authors use it. See Jonathan Bernard, "Minimalist Aesthetic in the Plastic Arts and Music," *Perspectives of New Music* 31, no. 1 (Winter 1993): 106; Timothy A. Johnson, "Minimalism: Aesthetic, Style, or Technique?;" Kyle Gann, "Minimal Music, Maximal Impact: Thankless Attempts at a Definition of Minimalism," NewMusicBox, 1 Nov 2001, http://newmusicbox.org/article.nmbx?id=1521 (accessed 29 Jan 2007); Schwartz, *Minimalists*, 9; Heisinger, "American Minimalism in the 1980s," 434-5.

85 Young, Phil Niblock, and other composers continue to write in the drone style.

But what exactly does that mean? Bernard's definition of postminimalism—though valid from a theoretical point of view—is problematic in practice because it is based on a level of historical or biographical influence, not necessarily based on specific, easily audible, musical characteristics.[86]

To avoid the problematic historical distinction of minimal vs. postminimal music and to give specific musical characteristics of these scores, I will be using the definition of minimalism as a technique found in Timothy Johnson's article "Minimalism: Aesthetic, Style, or Technique?" from *The Musical Quarterly.*[87] Johnson states that there are three possible definitions for minimalism: (1) minimalism as an aesthetic, (2) minimalism as a style, and (3) minimalism as a compositional technique. Minimalism as an aesthetic describes the earliest phase of minimalism, including ateleological (non-goal-directed) pieces such as La Monte Young's *Trio* (1958) and pure process pieces such as Riley's *In C* (1964) or Reich's *It's Gonna Rain* (1965). Minimalism as a style includes pieces that "have a continuous formal structure, an even rhythmic texture and bright tone, a simple harmonic palette, a lack of extended melodic lines, and repetitive rhythmic patterns."[88] This minimalist style would encompass works from the beginning of minimalism until around 1980; it admits compositions such as Reich's *Music for 18 Musicians* (1976), which has some harmonic goal-oriented parts that would preclude it from fitting under the minimalist aesthetic.[89] According to Johnson, pieces that employ the minimalist technique—which would embrace what are described as postminimal

86 Bernard, "Minimalism, Postminimalism, and the Resurgence of Tonality," 127.
87 Johnson, "Minimalism: Aesthetic, Style, or Technique?" 742-773.
88 *Ibid*., 751.
89 *Ibid*., 749.

compositions—use at least two characteristics of the above minimalist style.[90] The film music which I will discuss in Chapters Three through Seven fits Johnson's definition of minimalism as a technique. In addition, the film music to be examined employs the two characteristics most commonly associated with minimalism: a steady pulse and repetition.[91]

There is yet another reason for referring to both minimalism (in the strict sense) and postminimalism as subspecies of minimal music (in the broadest sense). What may seem to be distinctive stylistic differences to aficionados of new music may seem less so for non-specialists. Therefore, I refer to both minimalist and postminimalist film music as "minimalist" or "using minimalist techniques." This usage acknowledges that film audiences and film critics hear minimalism and postminimalism in a similar way—as something very different from the prevailing classical Hollywood scoring style.[92]

1.4 Classical Hollywood Film Scoring Practice

But what exactly is the prevailing style to which minimalism is opposed? By the mid-1930s, a set of conventions regarding film scoring had coalesced into what Kalinak terms the "classical Hollywood film score," which dominated scoring practice until the early 1950s.[93] The musical style of the 1930-40s classical Hollywood film score was

90 *Ibid*., 751.
91 I believe the fact that most postminimal works contain these two characteristics is why some authors continue to call the work of Glass and Nyman minimalism, not postminimalism.
92 Thus film critics invariably refer to soundtracks by Glass, Nyman, and others as minimalist.
93 While it has dominated scoring practice, not all films use this narrative-privileging model. Annette Davidson, *Hollywood Theory, Non-Hollywood Practice: Cinema Soundtracks in the 1980s and 1990s* (Burlington: Ashgate Publishing Company, 2004), 1; Kalinak, *Settling the Score*, xiv.

primarily a late 19th-century Romantic symphonic idiom heavily influenced by Wagner; it privileged the lyrical melody and the leitmotif.[94] This style is characterized by its melodies and themes, intense emotional expression, fluid rhythm, and chromatic harmonies. There are a number of proposed explanations for the dominance of this musical style that include its continuity with silent film musical accompaniment practice; the musical training of its principal composers, steeped in 19th century music; the conservatism of film producers; the sense of human subjectivity it provided to industrially produced scores; and the quick and seemingly transparent signification it offered to the audience familiar with its connotations.[95] Another theory explaining the use of the Romantic idiom is its flexibility, since it, according to film music theorists Buhler and Neumeyer, "flows easily between motivic and tonal modes of organization and can readily absorb such features as touches of local color, quotations from existing music, and imitations of earlier styles."[96]

Whatever the origins of the Romantic idiom's preeminence, the classical film score had a pool of conventions that were developed to serve the narrative, heightening its reality and drawing the audience into the story.[97] Gorbman gives a list of seven principles of the classical Hollywood film score:

(1) Invisibility: The physical source of the music (microphones, performers, etc.)

---

94 Kalinak, *Settling the Score*, 101, 104.

95 The conservatism of the film producers was likely tied to both profit margins and to the predictability of audience response to conventional scoring. Kalinak, *Settling the Score*, 100, 78; Davidson, *Hollywood Theory, Non-Hollywood Practice*, 33; Gorbman, *Unheard Melodies,* 4, 78-9.

96 James Buhler and David Neumeyer, "Film Studies/Film Music," *Journal of the American Musicological Society* 47, no. 2 (Summer 1994): 383.

97 Kalinak, *Settling the Score,* xv.

should not be seen on screen unless the music is diegetic (i.e., with a visible or understood source of music appearing as part of the world occurring on screen; see Glossary).

(2) "Inaudibility": The music should remain "background" or unobtrusive, not drawing attention to itself, and below any level of dialogue. The audience should not usually be conscious of it.

(3) Signifier of emotion: Kalinak calls this "implicit content"—where something is not "visually discernable in the image"—and says this is the most common way music is used.[98] Music may signify tension, excitement, romance, the irrational, or an epic feeling to what is occurring on screen.

(4) Narrative cueing: Music may evoke a sense of time and place, point of view, or mood, and may interpret a narrative event; with the opening title/end title music, it may denote genre, mood, and provide a sense of beginning and closure to the story.

(5) Continuity: Music may fill in the gaps in dialogue or action, and smoothes transitions and montages, thereby "bridging gaps of diegetic time."[99]

(6) Unity: Music is used to reinforce unity through tonal relationships, through the "musical envelope" provided by the opening and end title music, and through the use of musical themes or leitmotifs that are repeated and varied throughout a film.

98 Kalinak, *Settling the Score*, 86-7.
99 Gorbman, *Unheard Melodies*, 26.

(7) Any of the above principles may be violated in the service of another principle.[100]

These principles, and the symphonic Romantic style more generally, are exemplified in the film scores of Max Steiner (such as *Mildred Pierce*, 1945), Erich Wolfgang Korngold (*Captain Blood,* 1935), and Alfred Newman (*Gunga Din*, 1939; *All About Eve*, 1950).[101] While the classical film score was primarily of the Romantic idiom, composers such as Bernard Herrmann (*Citizen Kane*, 1941; *Vertigo*, 1958) used a more dissonant, sparse, non-thematic style in his scores for directors such as Orson Welles and Alfred Hitchcock;[102] while the style might have been outside the norm, his scores still follow the conventions of the classical film score.[103] Atonal music—still following the narrative-privileging scoring principles—began to be used in film scores such as *East of Eden* and *The Cobweb* (Leonard Rosenman, 1955).[104]

In the mid/late 1950s and 1960s, there was a great deal of experimentation in film scoring. Because of the rise of television and the breakup of the film studios, financial constraints led to the reduction of orchestral forces in smaller-budget films.[105] Epics such as *Ben Hur* (Miklós Rózsa, 1959), however, continued the tradition of the big orchestral

---

100 Gorbman, *Unheard Melodies*, 73-91.

101 Kalinak, *Settling the Score*, 79; Gorbman, *Unheard Melodies*, 91-98.

102 Herrmann is occasionally called a "minimalist" film scorer (Kalinak, *Settling the Score*, xvi), and *Los Angeles Times* critic Mark Swed even calls his *North by Northwest* score " the first great minimalist score." This term requires disambiguation; he is referred to this way because he used music sparingly, not because his music qualifies as minimalism as a style or technique. He is known for his ostinatos and for repeating short phrases, but his phrases are often quite chromatic and are repeated at different pitch levels. Robert Koehler, "Less is More: Minimalist Music at Film Forefront," *Daily Variety*, 22 Jan 1998.

103 Gorbman, *Unheard Melodies*, 4; Kalinak, *Settling the Score*, 139; Mervyn Cooke, "Film Music," *Grove Music Online* ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 1 Feb 2007).

104 Cooke, "Film Music," *ibid*.

105 Davidson, *Hollywood Theory*, 3.

score. Producers were interested in commercially viable music that would sell and that would sell the film. With the success of *Laura* (David Raskin, 1944) and *High Noon* (Dimitri Tomkin, 1952), the "theme score" or "monothematic score" proliferated, with one song—one that the producers wanted to make a "hit"—dominating the soundtrack.[106] Scores incorporating jazz elements became increasingly popular in the 1950s, including Elmer Bernstein's *Man with the Golden Arm* (1955), which also generated a hit song.[107] The 1960s marked the rise of the pop or compilation score, in such films as *The Graduate* (1967). Kalinak argues that 1960s pop scores often clashed with the conventions of the classical film score, unlike monothematic scores or jazz scores, which often followed the model of the classical score though employing a different musical idiom. The pop music was not inaudible, it did not create structural unity (as did the repetition of themes in the jazz or theme score), and it did not necessarily illustrate the narrative by showing emotion or underscoring action.[108] But in the 1970s, Kalinak asserts, pop scores began gradually to conform to the classical model, serving the narrative.[109] According to Jeff Smith, the compilation score often fulfills traditional film music functions such as narrative cueing—suggesting a sense of time and place—and setting mood, but its meanings are closely linked with the music's extramusical associations, i.e., it is "dependent upon the meaning of pop music in the larger spheres of society and culture."[110]

---

106 Kalinak, *Settling the Score*, 159, 172-3, 185; Cooke, "Film Music," *ibid*.
107 Kalinak, *Settling the Score*, 185.
108 Kalinak, *Settling the Score*, 187.
109 Kalinak, *Settling the Score*, 186-7; Davidson, *Hollywood Theory*, 48.
110 Jeff Smith, *The Sounds of Commerce: Marketing Popular Film Music* (New York: Columbia

In the mid 1970s, the film score returned to its roots with the resurgence of the symphonic, Romantic idiom.[111] Though many spectacle or epic films since Hollywood's "Golden Age" employed lush orchestral scoring, with films such as *Jaws* (1975) and especially *Star Wars* (1977), John Williams spurred a return to prominence of the style so popular in the 1930s and 1940s.[112] Since *Star Wars*, most of the highest-grossing blockbuster films have used Romantic orchestral film scores.[113] But though this idiom predominates among current blockbuster films, films since the 1980s reveal an astonishing array of musical styles, from the continued proliferation of the pop score to synthesized scores and scores using minimalist techniques.[114]

1.5 Minimalism and the Model of the Classical Hollywood Film Score

Minimal music is obviously quite different stylistically from the conventional idiom favored in the Golden Age of Hollywood and the post-*Jaws* "New Hollywood." It is not tonal per se, does not depend on lyrical melody, and does not lend itself to the kind of emotional expressionism and drama intrinsic to Romantic scoring. But as Kalinak has noted, the conventions of the classical film score model have withstood stylistic change.[115] How may this new film music style, minimalism, intersect with the classical model? What conventions work with the model, and what difficulties with the classical

---

University Press, 1998), 155.

111 Kalinak, *Settling the Score*, 188; Davidson, *Hollywood Theory*, 1-4, 48-9.

112 *Ibid*.

113 Davidson, *Hollywood Theory*, 53-4; "Variety Top 250 Films of All Time," *Variety,* http://www.variety.com/index.asp?layout=chart_top_250&dept=Film (accessed 2 Feb 2007).

114 Stilwell claims that the pop score is now the most common scoring type by the numbers. Stilwell, "Music in Films," 20; Kalinak, *Settling the Score*, 203.

115 Kalinak, *Settling the Score*, 203.

Hollywood film score model arise because of minimalism's stylistic characteristics? Let us consider each principle in turn.

(1) Invisibility: Minimalist music has traditionally been nondiegetic and its apparatus invisible. In only a few cases in a fictional narrative has minimalist music been diegetic, and in each case it has been "naturalized" by its source being shown on screen. In the 2005 "Valley of Darkness" episode of the science-fiction television series *Battlestar Galactica*, it is played by a futuristic version of a CD player. This use of minimalism as primarily nondiegetic is understandable, because the music is heard as modern. Its diegetic use in films set before the 1960s could be heard as anachronistic enough to disturb the reality of the narrative for the spectator. In *The Piano*, set in the mid-19th century, Nyman softens this anachronistic effect by fusing minimalism with Scottish folk song and Romantic pianisms. *Battlestar Galactica*, set at some unknown future date, can use minimalism to suggest music from its past.

(2) "Inaudibility:" Though minimalism has no difficulty in fulfilling the convention of invisibility, minimalist scores are not always inaudible. Often they draw more attention to themselves than do conventional film scores. Film critics (who rarely speak about film music at all in their reviews) have noticed this effect: "The score, by Philip Glass, is a study in egregiousness;"[116] "noisily telegraphed by Mr. Glass's serial intrusiveness;"[117] "Philip Glass's controversial score for Stephen Daldry's adaptation is

116 David Edelstein, "Behind Enemy Lines: Clint Eastwood's unshakable *Iwo Jima;* Judi Dench's acidity trip; and a Rocky you can kinda root for," *New York Magazine*, 25 Dec 2006, http://nymag.com/movies/reviews/25634/ (accessed 10 Feb 2007).

117 Manohla Dargis, "A Friendship Develops, and Obsession Follows," *New York Times*, 27 Dec 2006, Section E.

another one that breaks with the 'film music should be unobtrusive' credo;"[118] "Philip Glass's score ... is just as often intrusive and too prominent in the overall scheme;"[119] "Instead, the music—as with Glass' for "Kundun"—shifts from the background to the foreground, another rejection of standard movie scoring practice;"[120] "long passages in which the music on the sound track was at least as prominent as the action on screen."[121] One could speculate about several reasons for this audible effect. Perhaps it is because the scores are not in the familiar idiom, and are noticeable as a result. Minimalist music is used most often to smooth the "gaps" of the film; during a montage or transition, the music is more obvious than that used for emotional underscoring. Perhaps characteristics of the music itself draw attention to it; it is difficult to ignore a constant, precisely repeating pulse, which is one of the underlying theories behind alarm clocks and telephone rings. Or perhaps directors using minimalist scores intentionally bring the music to the foreground; as *New York Times* critic Anthony Tommasini says of *The Hours,* "Bringing the score to the foreground was clearly a conscious directorial choice."[122]

(3) Signifier of emotion: Minimalist film scores –like traditional ones–work well in establishing the mood for a scene. When combined with a fast tempo, the repeating

---

118 "*FilmMaker* Selects 20 Essential Movie Soundtracks," *Filmmaker: The Magazine of Independent Film*, http://www.filmmakermagazine.com/winter2006/line_items/permanent_rotation.php (accessed 10 Feb 2007).

119 Todd McCarthy, "The Hours," *Variety*, 16-22 Dec 2002.

120 Koehler, "Less is More," *ibid*.

121 Octavio Roca, " Composer Nyman Sets the Musical Mood," *San Francisco Chronicle*, 5 Nov 1995, Sunday Datebook.

122 Anthony Tommasini, "Film; The Great Film Score: Catch It if You Can," *New York Times,* 2 Mar 2003, Section 2.

pulse of minimalism can signify excitement or tension (*The Truman Show*, *Minority Report*). With a minor-inflected mode, minimalism, just like minor-inflected conventional classical Hollywood scores, can suggest a sense of melancholy (as in *The Hours* and *Gattaca*). It can create an epic feeling through its near-continuous presence, such as at the beginning of *Kundun*. But though it can furnish a mood, minimalism does not do as well with emotion and romance as do classical film scores; it frequently lacks the classical Hollywood score's emotional devices and cannot change quickly enough to adjust to emotional shifts taking place on screen.

Specific emotions in the classical film score are expressed through conventional devices that make the emotions explicit to an audience competent in interpreting their cultural code. Max Steiner's scores are a perfect example; as Gorbman notes, "his pseudo-Wagnerian orchestrations and harmonies draw on a well-established reservoir of emotive signification."[123] A lush string love theme may swell as a couple runs to meet each other or as a young man gazes at the object of his desire, all in slow motion.[124] This particular convention of the traditional film score is so recognized as a cliché that it is often parodied in comedies (*Wayne's World*) and commercials.[125] Composers might evoke fear with tritones and half steps, or sadness with descending minor *lamento* lines. They might evoke dramatic thrust through crescendos, surprise or shock through stingers

123 Gorbman, *Unheard Melodies*,7

124 This scene is often accompanied by the love theme from Tchaikovsky's *Romeo and Juliet Fantasy-Overture*, as in *Wayne's World.*

125 Priscilla Barlow, "Surreal Symphonies: *L'Age d'or* and the Discreet Charms of Classical Music," in *Soundtrack Available: Essays on Film and Popular Music*, eds. Pamela Robertson Wojcik and Arthur Knight (Durham: Duke University Press, 2001), 44-45.

(unexpected loud *fp* chords).[126] While these devices are culturally encoded, they also function as a differential system. The love theme's capacity to signify romance does not simply reside in itself, but because the music contrasts with the dissonant sounds of approaching terror. The classical Hollywood film score's ability to convey emotion thus derives both from its encoded associations and from the contrasts and flexibility intrinsic to its style.

But, according to film critic Andrew Stewart, while "convention dictates that love and action scenes are accompanied by appropriate mood music," minimalist composers like Michael Nyman have noticed that their scores "have preserved a rare distance from the onscreen emotional content."[127] Perhaps the reason for this is that the conventions making emotion explicit are not part of minimalism, which has limited melodic content (no long-lined Romantic melodies), tends to be consonant, and whose slow change rate and continuous form makes stingers and other signals of dramatic surprise completely uncharacteristic. These qualities of minimalism do not allow it to reflect every emotional nuance, every action of a scene through dramatic underscoring. The minimimalist style, with its long expanses and slow change rate, precludes—at least at a moment-to-moment level—the expressive differentiation available in Romantic scores. The contrast needed to show immediate emotional change is not available. Instead of portraying moment-to-moment feelings or drama, the most it can do is bathe an entire scene in affect, reflecting a general mood through its tempo, mode (though not tonal in the tonic-dominant sense

126 Kalinak, *Settling the Score*, 86-9.
127 Andrew Stewart, "Michael Nyman Changing Hollywood's Attitudes," *Music Week*, 21 Feb 1998.

minimalism often has major or minor-mode inflections that invoke the traditional responses in audiences), and orchestration. As film critic Koehler says, minimalism rejects "Western-style counterpoint and overtly dramatic, comedic or romantic voicings in favor of moods and tones."[128]

Without obvious conventions conveying changes in emotion, telling the audience exactly what the character is feeling and what they also should feel, a space is created between the film and the spectator. As filmmaker Errol Morris has said:

> Most music comments on the action, while minimalist music maintains a distance, which is right for my films, which keep an ironic distance from the subject. The kind of music both Philip [Glass] and Caleb [Sampson] make affords me detachment, and at the same time emotional connection, which seems contradictory but is true. The music is moving in itself, but it also resists the cliché of forcing the viewer to 'identify' with the character.[129]

This detachment is not characteristic of most classical narrative Hollywood film, where music is intended to "hypnotize" the audience into the fantasy being shown on screen, "to render the individual an untroublesome viewing subject: less critical, less awake."[130] But in many films that use minimalism in the score, such as *Gattaca* and *Solaris*, the director intends the audience to be critical, not simply to be swept up in the reality of the story but to ask questions about the film and its meaning.[131] This is not to suggest that films using minimalism do not express emotion, simply that the music is less likely to force

---

128 Koehler, "Less is More," *ibid*.

129 Koehler, *ibid*.

130 Gorbman, *Unheard Melodies*, 5. This sense of detachment is noted by *Film Score Monthly* author Jeff Bond, who says that "almost impossible to get emotionally involved with the filmic character of Kundun." Jeff Bond, "The Second Greatest Story Ever Told: Kundun," *Film Score Monthly Online*, 20 Jan 1998, http://www.filmscoremonthly.com/articles/1998/20_Jan---Kundun.asp (accessed 9 Feb 2007).

131 This is not to say that all films using a more traditional score disallow a critical mindset, nor that all films employing minimalism intend to create one.

identification or a particular emotional reading of a scene. Instead of compelling a particular reading, minimalist scores allow the spectator to choose their own reading based on the acting and elements of the mise-en-scène.

(4) Narrative cueing: Minimalist film scores, like conventional ones, easily demarcate narrative levels like the beginning and ending of a film; however, they do not as easily evoke a sense of time and place. Classical film scores, Gorbman notes, have established codes that easily signify time and place to the audience: 4/4 drumbeats for Indians, minor xylophone melodies for the East.[132] Like the classical score's emotional conventions, these clichés are not typically part of minimalism, though they are possible within its constraints. Minimalism does owe a debt to—or have an association with—non-Western musics; Riley and Glass acknowledge the influence of Indian music, while Reich was influenced by African drumming.[133] But the influence of these musics has customarily shown itself not so much in imitation of their sounds, but in structure;[134] thus, minimalist music may sound like an "other" to Western music, but this otherness is mainly non-specific as to a particular culture or time (see Chapter Five for a detailed discussion of this idea). Though minimalism does not often employ the time-and-place conventions of classical Hollywood scores, it—though rarely—does incorporate elements of other styles; for the score of *Kundun*, set in Tibet, Glass uses several Tibetan instruments including cymbals and ceremonial horns. For *The Draughtsman's Contract*,

132 Gorbman, *Unheard Melodies*, 83.
133 This is not a characteristic of all minimalism. Nyman, for instance, specifically denies any non-Western influence. Strickland, "Riley, Terry;" Strickland, "Glass, Philip;" Griffiths, "Reich, Steve;" Schwarz, *Minimalists*, 197.
134 Schwarz, *Minimalists*, 72-3.

set in England in 1694, Nyman employs Baroque materials, harpsichord, and a borrowed Purcell ground bass.[135] For *The Piano*, Nyman integrated Scottish folk tunes and some Romantic pianisms reminiscent of Chopin. But even when these style traits are used, the music still sounds like a product of the 20th or 21st century. Thus minimalism could be heard as anachronistic if used in a film—and some film critics do complain of this tendency—but this effect tends to occur more often when the music is presented as diegetic.[136] Perhaps because of this, minimalist techniques frequently appear in the science-fiction genre, where they would not acquire this anachronistic effect.

(5) Continuity: Minimalist music, because of its repetitions, requires fairly long cues so that the repetition can be heard. Because of its constant pulse, its rhythmic impetus also propels the music forward. The music can thus be stretched out indefinitely, but is not as easily trimmed as conventional cues. This trait of minimalism lends itself well to being used in places that allow longer cues: under montages and transitions and to fill any other gaps, assisting with the continuity of the film.

(6) Unity: Though Gorbman admits that not "all classical scores rely on themes," she calls them the "major unifying force in Hollywood scoring."[137] For examples, one can think of *Star Wars*' "Imperial March" or "Leia's Theme" (John Williams, 1977), or of the "Fellowship of the Ring," "Shire," or "One Ring" cues from the *Lord of the Rings*

---

135 Henry Purcell was a contemporary composer of the film's 1694 setting. Russell and Young, *Film Music*, 97.

136 Edward Rothstein of the *New York Times* says of the diegetic music of *The Piano*, "the music seems all too current, a late-20th-century creation, not the improvisations of a Victorian-era woman with an elaborate inner life." Edward Rothstein, "Critic's Notebook; A Piano as Salvation, Temptation and Star," *New York Times*, 4 Jan 1994, Section C.

137 Gorbman, *Unheard Melodies*, 90.

(Howard Shore, 2001-2003). These short musical themes help unify the films as leitmotifs, recalling associations built up around a character or object. But minimalism usually lacks pronounced melodies or traditional themes. Instead of short leitmotifs, on the few occasions that a minimalist score actually employs music that is repeated later, gathering associations, it uses long segments of music.[138] Leitmotifs are less frequent in minimalist than traditional film scores, though examples include *Solaris* (variants of the same music are used for the alien planet, see Chapter Four), *Carrington* (specific music for each character), and *Gattaca* (leitmotifs include the music which always occurs over ocean scenes, see Chapter Seven).[139]

Although minimalist scores frequently lack leitmotifs, minimalism manages to provide an even stronger sense of unity to a film than does traditional film scoring practice. As *Film Score Monthly* critic Jason Comerford notes, minimalistic techniques "very often ... can glue a film solidly together."[140] *Kundun* is an excellent example; its unity is provided through the nearly continuous strand of minimalism throughout the film. But even in those films that do not feature a continuous musical score, the technique of minimalism firmly unifies the film. National Public Radio's movie music critic Andy Trudeau remarked that *The Hours* score is effective "because it mirrors the film well—the intercutting of personal stories over a wide span of time, held together by

138 As mentioned under continuity, minimalist scores require somewhat long cues because of minimalism's stylistic characteristics.

139 Minimalist music is also used as a leitmotif for the character Hiro Nakamura in the NBC television series *Heroes,* while other characters such as Dr. Suresh have non-minimalist leitmotifs.

140 Jason Comerford, "The Best (& the Worst) of 2002: Six Things I've Realized about Film Music: 2002 in Review," *Film Score Monthly* 8, no. 1 (January 2003): 22-23.

a single musical approach."[141] The musical approach of minimalism is effective at unification because, instead of including recurring melodic themes, the minimalism *itself* is heard as a "theme." The repetitive, interlocking rhythmic cells—even if they are different—all appear/sound to the listener to come from the same source. Lacking melodic leitmotifs, the idea of repeating rhythmic pulsations takes their place.

But the use of minimalism itself as a recurrent, unifying feature is not the only way it can lend coherence to a film. Many films using minimalist scores are actually cut to the scores, in contrast to normal Hollywood practice. According to *New York Times* film critic Robert Koehler:

> In a striking rejection of traditional film music practice, Greenaway, from his early short films to his first features including "The Falls," "The Draughtman's Contract" and "A Zed and Two Noughts," told Nyman to simply provide him with music, and that the film would be cut to it—rather than the other, usual way around. Morris has worked precisely the same way with Glass and, now, with Sampson. And Scorsese cut most of "Kundun" in strict rhythm to Glass' Tibetan-inspired score.[142]

This cutting from the music allows for a very organic relationship to form between the score and film, unifying them in a fundamental way. For *Koyaaniqatsi* and the other *Qatsi* films, the filmic aspect and musical aspect are completely one. But cutting from the score allows other films to have this sense of organic unity, as expressed in the *Kundun* review by Pico Iyer in the *New York Review of Books:* "It proceeds, really, more like a piece of music than a film ... and its scenes from the life of the Dalai Lama build with such hypnotic restraint that the star of the film might be said to be its composer,

---

141 "75th Annual Academy Awards: Listening to the Academy Awards: Oscar-Nominated Film Scores," NPR Online, 23 Mar 2003, http://www.npr.org/news/specials/oscars2002/scores.html (accessed 10 Feb 2007).

142 Koehler, "Less is More," *ibid*.

Philip Glass."[143]

Though I have described in this section the typical interactions of minimalism with the conventional scoring model, I must add a caveat. What I have defined as minimalism is a generic concept, just like the terms "Classical" and "Romantic" are concepts encompassing a broad range of potential musical expressions. Minimalist compositions exist on a continuum, with works being "more" minimalist if they are a closer fit with the characteristics described in Section 1.4. The further a cue gets from "pure" minimalism—and the closer it gets to something resembling the Romantic style of the classical scoring model—the more it can take on the functions of that model. A minimalist film cue that has a hint of a melody might serve as a sign of emotion—or force audience identification with a character—more so than a "pure" minimalist cue. This notion of a minimalist continuum informs the analytical case studies I introduce in Chapters Three through Seven.

1.6 A Method for Analyzing Minimalist Techniques in Film

Though minimalist techniques occasionally fit elements of the classical Hollywood score—as shown in the above discussion—and in those instances can be analyzed as such, minimalist music is often at odds with the classical model. If minimalist techniques, then, have difficulty fitting into conventional categories, how is a scholar to interpret the music's function in these scores? Recent scholarly work by Nicholas Cook, Rebecca Leydon, and Susan McClary all prove valuable in developing a

143 Koehler, *ibid*.

method to decode the meaning of minimalist techniques in film scores.[144]

A good place to begin when attempting to decipher minimalism in film is to ask how and why classical scores act in the way they do. A conventional Hollywood film score may have a "love theme," which functions as a signifier of romantic love. This signification is culturally encoded; listeners/viewers familiar with this code will correctly interpret an expressive, lyrical melody as a sign of emotion. But as Nicholas Cook argues in "Theorizing Musical Meaning," socially constructed meaning—the enculturation of these codes—is only part of the equation. Meaning is also partially dependent on music's structural properties: "The meaning that the object acquires within a specific culture is thus supported by—and at the same time helps to stabilize—the specific selection of attributes which that culture has made ... while meaning is socially constructed, it is both enabled and constrained by the available attributes of the object."[145] In Cook's *Analysing Musical Multimedia*, he proposes a metaphor model for meaning that requires some kind of "enabling similarity" between the attributes of the music and with what it is connected. The enabling similarity allows the music to transfer its attributes to the image, making meaning.[146] What attributes of the love theme enable it to signify romance, and what are the enabling similarities between the two? A love theme might have a prolonged dynamic buildup before a harmonic resolution (as in

144 Nicholas Cook, "Theorizing Musical Meaning," *Music Theory Spectrum* 23, no. 2 (2001): 170-195; Nicholas Cook, *Analysing Musical Multimedia* (Oxford: Clarendon Press, 1998); Rebecca Leydon, "Toward a Typology of Minimalist Tropes;" Susan McClary, "Minima Romantica," in *Beyond the Soundtrack: Representing Music in Cinema*, eds. Daniel Goldmark, Lawrence Kramer, and Richard Leppert (Berkeley: University of California Press, 2007).

145 Cook, "Theorizing Musical Meaning," 178-9.

146 Cook, *Analysing Musical Multimedia*, 69-81.

Tchaikovsky's *Romeo and Juliet Overture*); the enabling similarity could be the building desire/sexual tension of Romantic love and then the eventual consummation of that desire.

Can these ideas prove valuable when analyzing minimalist scores? Cook claims that his method works for any kind of music-multimedia interaction, though he does not give an example using a minimalist score. And can minimalism mean anything at all? As McClary recounts, "The flat-line procedures of minimalism frequently seem to have pulled the plug ... on the very notion of signification in music." But, like McClary, this author believes that minimalism, "like all cultural practices ... engage[s] with meaning."[147] An examination of Susan McClary's essay "Minima Romantica" proves suggestive as to whether Cook's theories can be applied to this musical technique. In this essay, McClary claims that Glass's music in *The Hours* might reference "Romantic signs of hope and yearning," but that his music—being minimalist, and not traditionally tonal—is "always doubling back to resignation."[148] Since it always loops back, it cannot suggest transcendence; except in one case, it never really resolves musically. Because of these characteristics, McClary conjectures that the meaning of the music and of the film are the same: that one's life is a succession of hours that one must live through, hoping for a release or dream that may never come.[149] Her analyses of *The Piano* and *Angels and Insects* reiterate the same meaning for minimalism, one also advanced by Fink in

147 McClary, "Minima Romantica," 52.
148 McClary, "Minima Romantica," 57.
149 McClary, "Minima Romantica," 57-63.

Repeating Ourselves: as a symbol for obsessive desire that cannot meet repose.[150] McClary does not explicitly state her model or basis for analysis, though she seems to be following the same method as proposed by Cook. She ties the meaning of the minimalist cues closely to their attributes, finding with what narrative or filmic elements with which the music may have an enabling similarity.

So while they work with classical scores, Cook's ideas also prove a powerful tool for unlocking the meaning of minimalist film scores. As Cook suggests, musical pieces—what he calls a "musical trace"—can have a variety of potential meanings.[151] These meanings are dependent on what attribute a culture selects from that musical trace.[152] McClary uses minimalism's lack of resolution (as defined in Classical and Romantic music), but there are many other musical attributes of the technique that can contribute to meanings. So minimalism's intrinsic musical characteristics, such as repetition, limited expressiveness, and static nature should then be the basis for analysis of its meaning in film.

But what potential meanings, besides McClary's unresolved desire, are possible with minimalist scores? Rebecca Leydon's "Toward a Typology of Minimalist Tropes" provides a new way of looking at meaning in minimalist concert music, not simply relegating it to its standard interpretation of "loss of subjectivity," but describing how different repetition strategies can contribute to a variety of affects in minimalist

---

150 Tying musical meaning to the creation and fulfillment of desire has been one of McClary's perennial concerns; see Susan McClary, *Feminine Endings: Music, Gender and Sexuality* (Minneapolis: University of Minnesota Press, 1991).

151 Cook, "Theorizing Musical Meaning," 188.

152 Cook, "Theorizing Musical Meaning," 183, 178-9.

compositions.[153] The tropes Leydon describes are useful not only for her specific subject—meaning in concert music—but also offer a tantalizing ready-made toolbox of potential meanings for minimalism in film. Leydon develops six tropes that minimalist compositions may project by using different repetition strategies:

1. "Maternal": suggests a regression to an infantile state
2. "Mantric": depicts a mystic state
3. "Kinetic": "repetition depicts (or incites) a collectivity of dancing bodies"
4. "Totalitarian": entraps the musical subject, making a "prison house effect"
5. "Motoric": repetition "evokes an 'indifferent' mechanized process"
6. "Aphasic": "repetition conveys notions of cognitive impairment, madness, or logical absurdity."[154]

According to Leydon, the title of a work or its other elements (such as timbre) contribute to which of these tropes a composition's repetition may suggest. But the element she focuses on for determining a particular affect is whether the music's repetition is more "musematic" (repeating mostly short, unvaried gestures) or "discursive" (repeating more complete units like phrases or phrase groups); it is also constrained by how the ostinati interact with other musical elements, be they other repeated gestures or non-ostinati lines.[155] Though I would agree with Leydon that the type of repetition is part of determining affect, I would argue that a minimalist composition's other elements prove at least—if not more—important. A piece employing musematic repetition but performed

153 Leydon, "Toward a Typology of Minimalist Tropes."
154 Leydon, *ibid*.
155 Leydon, *ibid*.

sensitively with alto voice at a slow tempo and soft dynamic could be considered as maternal or mantric—the gentle, human performance suggesting a comforting association; the same work performed at a frenetic tempo with no dynamic differentiation by an electronic instrument could be read as totalitarian or motoric, with the performance more like a machine's than a human's. Timbre, dynamics, and tempo are as important to interpretation as repetition strategy.

While Leydon's tropes prove a valuable resource, care must be taken when importing them for use in film score analysis. Where Leydon admits that a composition's title or "other textual elements" may influence a concert piece's interpretation, for the analysis of multimedia those other elements are of utmost importance; meaning is not constructed through music alone. Though the meanings of film music are tied to its musical attributes, they are also informed by the diegesis. It is through the interaction of music and image that the meaning becomes emergent.

What then has minimalism come to mean in multimedia? Using the above method—tying the meaning of minimalist music to its attributes and its interaction with film—I viewed/listened to more than thirty films employing minimalist techniques in their scores, attempting to find any commonalities or threads between them. Interested in minimalism's potential socially-constructed meanings in popular culture, I focused on recent films which have either reached or were intended to reach a mass audience, as a meaning's enculturation is predicated on its familiarity to a wide audience.[156] I paid

156 See J. Peter Burkholder, "A Simple Model of Associative Musical Meaning," in *Approaches to Meaning in Music*, eds. Byron Almén and Edward Pearsall (Bloomington and Indianapolis: Indiana

particular attention to movies which use minimalism for only part of their scores, as the composers might then be using the technique for a particular (possibly symbolic) meaning.

Though minimalism was used in these films in a variety of ways, three large trends began to emerge: minimalism used to mark Otherness, the mathematical mind, and dystopia. Chapters Three through Seven will discuss various ways these meanings have been expressed and how they intersect with the musical characteristics of minimalism, as well as linking these meanings to Leydon's tropes as appropriate. First, however, Chapter Two will trace minimalism's trajectory from being used in avant-garde and art films to its arrival as a potent force in Hollywood cinema.

University Press, 2006), 78.

CHAPTER TWO
A HISTORY OF MINIMALISM IN FILM

2.1 Introduction

Many people have heard Philip Glass's music for *The Truman Show* or *Koyaanisqatsi*, but few realize that the history of minimalism's use as film music reaches back even before Terry Riley's *In C* brought the style out of the underground and onto the LP. During the 1960s and 1970s, minimalist music was an avant-garde phenomenon; this status is reflected by the films of that era that used the style on the soundtrack. Short films, experimental films, documentaries, and foreign films were the typical genres of these decades to employ minimalism, and are still genres that often draw upon minimalist scores. Reich, Riley, Glass, and then Nyman began to write music for film, but each only wrote a few scores during this time.

Following Glass's success with *Koyannisqatsi* (1982), an avant-garde film that reached a mainstream audience, the trickle of minimalist scores became a torrent, with Glass and Nyman each writing at least one almost every year since. The 1980s saw dozens of minimalist scores, many of which were still situated in more "high-brow" film genres, but minimalism also began to be commercially appropriated. By the 1990s, minimalist soundtracks were used in mainstream Hollywood horror and science-fiction films, and minimalist techniques were used by "non-minimalist" composers even in what are otherwise more conventional scores. In the late 90s, the mainstream press noticed this influx, with *Daily Variety* critic Robert Koehler exclaiming, "Something remarkable

happened in 1997. More than 30 years after it began to make a cultural ripple in the studios, lofts and clubs of downtown Manhattan, minimalist music is being heard all through the cineplexes of America."[1] By the first half of the 2000s, minimalist music had been absorbed into popular audio-visual culture, becoming commercialized; it appears in television shows including *Battlestar Galactica*, commercials, and in big-budget studio blockbusters such as *A Beautiful Mind.* By detailing the work of its major composers, this chapter will trace this little-known history of minimalism's use in the film score from its avant-garde origins to its commercialization by mass culture.[2]

2.2 Steve Reich

Among the composers who would later be identified closely with minimalism, Steve Reich was the first to score a film. Because of his ties to the San Francisco avant-garde theater scene in the 1960s, he had the opportunity to work with two Bay Area experimental filmmakers, Robert and Gunvor Nelson, on short films. After moving to New York in late 1965, he concentrated on writing concert works. Uninterested in scoring films, his music found its way only sporadically onto the film soundtracks of short and foreign films until the 2000s. Since then, his previously composed music has been appropriated for numerous soundtracks for documentaries and even for a feature film. Although never a prolific film composer, Reich's music has influenced mainstream scores, and he has also been involved with film in a non-traditional way since the early

1 Robert Koehler, "Less is More: Minimalist music at film forefront," *Daily Variety*, 22 Jan 1998.
2 The specialized terminology used throughout this chapter and dissertation is defined in Appendix D. See Appendix A, B, and C for chronologies to accompany the information presented in this chapter.

1990s, when he began collaborating with his video-artist wife, Beryl Korot, on two "video operas."

The first film Reich scored was in 1963, after he had become affiliated with both the San Francisco Tape Music Center and the political satire theater group The San Francisco Mime Troupe.[3] In 1963, several members of the Troupe collaborated on the short film they named *The Plastic Haircut*.[4] Robert Nelson, its director, enlisted Reich—who had been writing music for the Mime Troupe's stage shows—to score this experimental film.[5] Reich produced his first complete tape piece for the film, a collage made by taping parts of the LP "The Greatest Moments in Sports."[6] According to Reich, the composition "turned into noise through over-dubbing with loops, rather like a surrealist rondo."[7] In 1965, Nelson turned again to Reich to score his *Oh Dem Watermelons*, a short on racial stereotypes shown right before the intermission of The San Francisco Mime Troupe's "A Minstrel Show or Civil Rights in a Cracker Barrel."[8] The two collaborated one last time for the 1965 short film *Thick Pucker*, which, like *The Plastic Haircut*, uses sound montage.[9] The unavailability of Nelson's films makes it

3 D.J. Hoek, *Steve Reich: A Bio-Bibliography* (Westport: Greenwood Press, 2002), 4; Strickland, *Minimalism: Origins*, 183

4 Robert Nelson, "We were bent on having a good time: An Interview with Robert Nelson," interview by Scott MacDonald, *Afterimage* (Summer 1983): 39.

5 Strickland, *Minimalism: Origins*, 183; Potter, *Four Musical Minimalists*, 161.

6 Reich, *Writings on Music*, 10.

7 Strickland, *Minimalism: Origins*, 184; Steve Reich, "Steve Reich: An Interview with Michael Nyman," interview by Michael Nyman, *Musical Times* 112 (Mar 1971): 230.

8 Nelson, "We were bent," 40; R. G. Davis, *The San Francisco Mime Troupe: The First Ten Years* (Palo Alto: Ramparts Press, 1975), 62; Strickland, *Minimalism: Origins*, 184; "History," San Francisco Mime Troupe, http://sfmt.org/company/history.shtml (accessed 1 Sept 2006); Reich, *Writings on Music*, 15; Susan Vaneta Mason, *The San Francisco Mime Troupe Reader* (Ann Arbor: The University of Michigan Press, 2005), 42.

9 Earl Bodien, "The Films of Robert Nelson," *Film Quarterly* 20, no. 3 (Spring 1967): 52.

difficult to determine if the scores for these films are actually minimalist or are better described as musique concrète; however, reviews of both *Thick Pucker* and *O Dem Watermelons* do mention repetition.[10]

Unhappy with the developing hippie scene and lack of freelance musicians to perform his works in San Francisco, Reich returned to New York in 1965 and concentrated on phasing techniques for both tape and live instruments.[11] This experimentation led to works such as *Violin Phase* (1967), performed in the late 1960s in art gallery concerts.[12] He found time during 1969 for one last experimental film score, this time collaborating with Patrick Gleeson for the music for an avant-garde short by Robert Nelson's then wife, Gunvor Nelson, titled *My Name is Oona*.[13]

Reich would not compose any more film music—either for the Nelsons or for any other filmmaker—during the rest of the 1960s and 1970s, instead focusing his energy on composing works for the concert hall. After the premiere of his *Music for 18 Musicians* (1976), Reich was critically lauded, and commissions flooded in for orchestral works.[14] Since he was busy with touring and composing larger works like *Tehillim* (1981) and *Different Trains* (1988), he had little time for film scores; and, unlike Glass or Nyman, he simply had no desire to compose for them. It is not that he has lacked the opportunity—

10 Bodien, "The Films of Robert Nelson," 52; Davis, *The San Francisco Mime Troupe,* 62.
11 Reich, *Writings on Music*, 15-6; Hoek, *Steve Reich: A Bio-Bibliography*, 6.
12 Griffiths, "Steve Reich."
13 "Eye and Ear Controlled Festival 9 Jun 2006," Anthology Film Archives, http://www.anthologyfilmarchives.org/schedule/?festival_id=1 (accessed 28 Aug 2006); John Sundholm, "Gunvor Nelson and the aesthetics of sensual materiality," Avanto Helsinki Media Art Festival, 11/20-23/2003, http://www.avantofestival.com/2003/en/film_nelson_2.html (accessed 2 Sept 2006); Brandon Stosuy, "Eye and Ear Controlled," *The Village Voice,* 17 May 2005, http://www.villagevoice.com/film/0520,wavelengths,64012,20.html (accessed 3 Sept 2006).
14 Schwarz, *Minimalists*, 82.

he has been asked to do so—but he has consistently declined these offers; according to Reich, "I just ask them to send a cheque if they want to use a piece I have already written."[15]

Though he spurned further opportunities to compose for film, Reich's music has still found its way onto soundtracks. It was used in two Mexican shorts in the 1980s,[16] and in 1992 his music (along with that of several other composers) was included in *Árnyék a havon*, or *Shadow on the Snow*, a black-and-white Hungarian arthouse feature directed by Attila Janisch.[17] After decades of few films with music by Reich, a surge of them appeared after 2000. Reich's music has been employed on the soundtracks of three short films, three documentaries, and a feature film, *The Dying Gaul* (2005).[18] An arthouse film directed by Craig Lucas in his debut, *The Dying Gaul* is the first and only feature film in English made up primarily of Reich's music, employing selections from his previously composed pieces including *Drumming*, *The Desert Music*, and *Eight*

---

15 Mark Furness, "Music of 'another planet' now down to earth!," *The Advertiser/Sunday Mail* (South Australia), 16 Feb 1990.

16 *La Espera* and *El Aventon* were both shot in Mexico and directed by Gisela Iranzo. "La Espera," *CATALOGO CUEC*, 1963-1989, 72, from database *Filmographía Mexicana,* http://www.unam.mx/filmoteca/filna/acceso.html (accessed 3 Sept 2006); "El Aventon." *CATALOGO CUEC*, 1963-1989, 67, from database *Filmographía Mexicana,* http://www.unam.mx/filmoteca/filna/acceso.html (accessed 3 Sept 2006).

17 Available sources do not say if the music was composed specifically for the film or if it was pre-existing, though it would be fairly safe to presume from his statement quoted above that it was pre-existing. Stephen Holden, "Review/Film Festival: On the Run in a Hostile Hungary," *New York Times*, 31 Mar 1992, section C; Alan Goble, "Arnyek a Havon," Complete Index to World Film, http://www.citwf.com/film334438.htm (accessed 6 Sept 2006).

18 Short films with music by Reich include the 2002 *Hold On*, directed by Glenn Ripps, and documentaries include *Refuge* (2005, directed by John Halpern), which details how Westerners have sought spiritual refuge through the Buddhism of the East, and how Tibetans have sought political refuge in the West. "Refuge" Official Website, http://www.refugefilm.com/page.htm (accessed 11 Sept 2006); "The Short Films F-M for 2003," Woods Hole Film Festival, http://woodsholefilmfestival.com/archive/2003/2003filmshortsF-M.html (accessed 4 Dec 2006).

Lines.[19]

So although Reich's music has yet to make it into a mainstream Hollywood movie, it has traced a path from being used only for avant-garde film to appearing in documentaries and arthouse features. But despite its lack of employment in mass-market cinema, it has still influenced the music of popular film. Reich claims that the score for the Tom Cruise blockbuster comedy *Risky Business* (1983), by the rock group Tangerine Dream, "was an out and out ripoff of 'Music for 18 Musicians.' I should have sued."[20] Thomas Newman's score for 1999's *American Beauty*—though not a direct imitation—also seems to recall Reich through its mallet percussion-heavy minimalism.

After his long absence from composing original music for multimedia, Reich has recently been involved with film in non-traditional ways. Collaborating with his wife, the video-artist Beryl Korot, Reich has integrated film into two "documentary" or "video operas."[21] *The Cave*, Reich's first work for music-theater (1993), focuses on the Torah and Koran's story of the patriarch Abraham and his relatives; it features a live vocal quartet and a small instrumental ensemble, samples, and video interviews projected on five screens.[22] Reich and Korot collaborated a second time for *Three Tales*, a 2002 work

---

19 *The Dying Gaul*, DVD, directed by Craig Lucas (2005; Los Angeles, CA: Sony Pictures, 2006).

20 Tim Page, "Steve Reich, a Former Young Turk, Approaches 50," *The New York Times*, 1 Jun 1986, Section 2.

21 Beryl Korot and Steve Reich, "Two Conversations About Three Tales," interview by Robert Wilder Blue, US Opera Web: Online Magazine Devoted to American Opera, http://www.usoperaweb.com/2002/september/threetales.htm (accessed 12 Sept 2006); Jim Cotter, "Steve Reich," in *Music of the Twentieth-Century Avant-Garde: A Biocritical Sourcebook*, ed. Larry Sitsky (Westport: Greenwood Press, 2002), 389.

22 Michael Walsh, "Words are Sliced and Diced," *Time Magazine,* 31 May 1993, http://www.time.com/time/magazine/article/0,9171,978635-1,00.html (accessed 12 Sept 2006); "Steve Reich Biography," NewMusicBox, http://www.newmusicbox.org/archive/firstperson/reich/bio.html (accessed 12 Sept 2006); Hoek, 19.

that looks at mankind and its relationship to technology.[23]

2.3 Terry Riley

Like Reich, Terry Riley has demonstrated little interest in composing scores: "I never did have a desire to write film music ... but people approached me."[24] Though not a prolific scorer, Riley began a film career in the late 1960s that has been strongly influenced by his famous 1969 album *A Rainbow in Curved Air/Poppy Nogood and the Phantom Band.* Since 1969, Riley's pre-existing works (often the *Rainbow/Poppy* album) have been appropriated for films ranging from avant-garde shorts to European features. In 1970, Riley began composing specifically for film in his distinctively improvisatory vein; though the music might be newly-composed, it is often based on, and sounds similar to, pre-existing compositions, especially the *Rainbow/Poppy* recording.

Like Reich, Riley began with experimental films, but then wrote numerous feature film scores in the years 1972-1976, leading one author to note, "The composer's worklist ... gives the impression that he spent at least two years composing, or improvising, nothing but the film scores which came his way."[25] After this spate of feature scores in the 1970s and one last experimental film, Riley gave up writing for the cinema and

---

23 The same human/technology theme is explored in the Glass/Reggio film collaborations of the *Qatsi* trilogy, beginning decades earlier than *Three Tales*. Bikini Atoll bomb test footage, used in this opera, was first used with a minimalist music in the 1976 *Crossroads*, with soundtrack by Patrick Gleeson and Terry Riley. Paul Griffiths, "Music Review; An Atomic Bomb, a Zeppelin, a Warning About Genetic Manipulation," *New York Times,* 14 May 2002, Section E; Steve Reich and Beryl Korot, "Steve Reich and Beryl Korot," an interview by Julia Wolfe, *BOMB Magazine*, http://www.bombsite.com/reich/reich.html (accessed 12 Sept 2006).

24 Julian Cowley, "Terry Riley: Happy Endings," *Wire: Adventures in Modern Music*, April 2007, http://www.thewire.co.uk/articles/163/ (accessed 1 Jan 2008).

25 Potter, *Four Musical Minimalists*, 135

devoted himself to studying Indian music and just intonation.[26] He would not return to film composition until 1984, for one last original score.

Riley's first foray into film as a minimalist was as both performer and composer in the 1969 *Music with Balls*.[27] This innovative video was part of a series funded by the Dilexi Foundation of San Francisco, "one of the first efforts to present works created by artists specifically for television."[28] *Music with Balls* presents both the music of Riley and the sculpture of Arlo Acton, with whom the composer often worked in the late 1960s.[29] John Coney directed the film, which shows Riley performing a segment of his 1967 piece *Poppy Nogood and the Phantom Band* while an Acton action sculpture is spinning around him.[30]

Then, in 1970, when Riley had "largely abandoned notated composition" for improvisation, he began composing and improvising original music for film, beginning with experimental cinema.[31] The composer collaborated with friends he had made while in Young's Theatre of Eternal Music—Tony Conrad and John Cale—for Conrad's second

---

26 Potter, *Four Musical Minimalists*, 137-9.

27 One partly-Riley soundtrack predates the minimalist movement in music. A short documentary about sculptor Claire Falkenstein, *Polyester Moon* (1958), has a improvised score by Riley (piano), Pauline Oliveros (French horn), and Loren Rush (koto). Julian Cowley, "Terry Riley: Happy Endings," *ibid*.

28 "The Dilexi Series," searched under "Series title" on "Past PFA Film Notes," Pacific Film Archive, http://www.bampfa.berkeley.edu/resources/film_notes/ (accessed 18 Sept 2006); Potter, *Four Musical Minimalists*, 135.

29 Wim Mertens, *American Minimal Music*, 35.

30 "Eyes & Ears: The Other Minds Film Festival," Other Minds Festival 8-10 Nov 2002, http://www.otherminds.org/shtml/Eyesandears1.shtml (accessed 19 Sept 2006); "Terry Riley on Film," Film Radar, Film Screening, 30 Sept 2005, http://www.filmradar.com/calendar/item.php?id=1334 (accessed 18 Sept 2006); Gene Youngblood, *Expanded Cinema* (New York: Dutton, 1970), 294. Also available online at http://www.ubu.com/historical/youngblood/youngblood.html.

31 Strickland, "Riley, Terry."

film, *Straight and Narrow* (1970),[32] which features hypnotic images accompanied by a "raucous Terry Riley/John Cale jam."[33] The same year, Riley's music was also employed in experimental filmmaker Standish D. Lawder's *Corridor*.[34] Although Riley was now composing for multimedia, his pre-existing pieces were also being appropriated by filmmakers. Director Nadine Trintignant utilized part of his *A Rainbow in Curved Air* in the 1971 French feature *Ça n'arrive qu'aux autres* (*It Only Happens to Others*),[35] and the following year the same piece was deployed as the musical score for an early computer animated film, *Matrix III* (1972), by animation pioneer John Whitney.[36]

By 1972, the fame Riley had garnered in the 1960s (especially with the recording release of *In C* in 1968) paid off with contacts that led to feature films.[37] Over the next several years, Riley would compose for several European features with improvisations based on earlier works.[38] His first was the French film *Les Yeux fermés* (*The Closed*

---

32 Mertens, *American Minimal Music,* 29.

33 Joel Stern, "The Composer-Filmmaker," *Real Time Arts*, Aug-Sept 2005, http://www.realtimearts.net/article/issue68/7955 (accessed 1 Jan 2008).

34 "What's On: Puls8 Films," Brisbane Powerhouse Center for the Arts, http://www.brisbanepowerhouse.org/program/index.cfm?fuseaction=summary&id=563&sd=1&sm=4&sy=2006&ed=30&em=4&ey=2006&ct_id=0&sort=&q=&cost= (accessed 5 Sept 2006); "Standish Lawder," Lawder, Standish under "Filmmaker Index," Canyon Cinema, http://www.canyoncinema.com/rentsale.html (accessed 12 Sept 2006).

35 "Ça n'arrive qu'aux autres," Internet Movie Database, http://www.imdb.com/title/tt0068026/ (accessed 6 Sept 2006); "Ça n'arrive qu'aux autres," All Movie Guide, http://www.allmovie.com/cg/avg.dll?p=avg&sql=1:96895~T0 (accessed 6 Sept 2006).

36 There are varying reports on exactly which Riley recording was used for *Matrix III*; I have repeated here information from Whitney himself, as found in his book *Digital Harmony*. In 1973, Riley's *Rainbow/Poppy* music was used again in a French feature, *La Chute d'un corps*, directed by Michel Polac. John Whitney, *Digital Harmony: On the Complementarity of Music and Visual Art* (Peterborough: Byte Books, 1980), 226; William Moritz, "Digital Harmony: The Life of John Whitney, Computer Animation Pioneer," *Animation World Magazine*, August 1997, http://www.awn.com/mag/issue2.5/2.5pages/2.5moritzwhitney.html (accessed 19 Dec 2006); Julian Cowley, "Terry Riley: Happy Endings," *ibid*.

37 Potter, *Four Musical Minimalists*, 133-135.

38 *Ibid*, 135.

Eyes, 1972)*,* directed by Joël Santoni. The director, fascinated with the 1969 *A Rainbow in Curved Air* LP, called the composer while he was studying in India and asked him to come to France to score the film. Riley produced film music for *Les Yeux fermés* that in both materials and orchestration sounds similar to his *Rainbow in Curved Air/Poppy Nogood* recording.[39] Drawing again from his *Rainbow/Poppy* album, Riley's score for the 1974 European sci-fi thriller *Lifespan* (*La Secret de la Vie*, directed by Alexander Whitelaw) is made up of raga-like saxophone improvisations over organ background, including segments taken directly from *Poppy Nogood and the Phantom Band*.[40]

After partnering with Patrick Gleeson for the music for a final experimental film—Bruce Conner's 1976 *Crossroads*—Riley abandoned film scoring for nearly a decade.[41] But this long hiatus was broken by a director inspired by Riley's music. According to Royal S. Brown,

> Before shooting *No Man's Land* in 1985, Swiss director Alain Tanner had heard music by Terry Riley in a concert. After the concert, Tanner went to Riley and told him, "You've just composed the music for my next film." When Riley asked Tanner what the film was about, he was informed that it had not even begun to take shape. After inspiring *No Man's Land*, Riley's music then became that film's nondiegetic score.[42]

The music for *Niemandsland*, or *No Man's Land* (1985), an arthouse feature set on the Franco-Swiss border, is a recording of Riley's improvisations with sitarist Krishna Bhatt,

---

39 The soundtrack was released on vinyl as *Happy Ending.* Potter, *Four Musical Minimalists*, 135; Cowley, "Terry Riley: Happy Endings," *ibid*.

40 *Lifespan*, DVD, directed by Sandy Whitelaw (1975; Amsterdam, Netherlands: Mondo Macabro, 2006).

41 P. Adams Sitney, *Visionary Film: The American Avant Garde 1943-2000*, 3rd. ed. (New York: Oxford University Press, 2002), 293; MacDonald, *A Critical Cinema: Interviews with Independent Filmmakers* (Berkeley: University of California Press, 1988), 252-3; "Bruce Conner," Canyon Cinema, http://www.canyoncinema.com/C/Conner.html (accessed 19 Sept 2006).

42 Brown, *Overtones and Undertones*, 22-23.

a version of what they were playing the night of the Geneva concert Tanner attended.[43] Though *Niemandsland* is Riley's most recent newly composed score, his pre-composed music has continued to be sporadically employed in documentaries, including the 1991 *Pictures from a Revolution* and the 2000 Swedish short *Jag minns Lena Svedberg.*[44] Less visible as a composer in the past few decades than Glass and Reich, his music has also been less employed in the cinema.

2.4 Philip Glass

Unlike Riley or Reich, Glass seems to enjoy composing for film; his affinity for theatrical music of all kinds—one not shared by those other two minimalists, who rarely write for stage or film—has led to a prolific opera and scoring career.[45] Glass simply views film, like ballet and opera, as a multimedia participation of music and image, and approaches film as he does the other theatrical forms.[46] The composer possesses a fondness for close collaborations; he has worked with novelist Doris Lessing for his opera *The Making of the Representative for Planet 8* and popular songwriters including Paul Simon and Laurie Anderson for his cycle *Songs from Liquid Days*.[47] This

43 Vincent Canby, "'No Man's Land,' Drama of French-Swiss Border," *New York Times*, 5 Oct 1985; Cowley, "Terry Riley: Happy Endings," *ibid.*

44 *Pictures from a Revolution* is a documentary directed by Susan Meiselas, Richard P. Rogers, and Alfred Guzzetti, with original music by William Eldridge. *Jag minns Lena Svedberg* was directed by Carl Johan De Geer. *Pictures from a Revolution*, VHS, directed by Susan Meiselas, Richard P. Rogers, and Alfred Guzzeti (1991; Nicaragua: Kino Video, 1991); Carl Johan De Geer, "I Remember Lena Svedberg," Bokomotiv Film Produktion AB, http://www.bokomotiv.se/eng/fi_lenasvedberg_eng.asp (accessed 20 Sept 2006).

45 Reich has only recently, with *The Cave* and *Three Tales*, approached opera.

46 Russell and Young, *Film Music*, 121.

47 Glass, *Music by Philip Glass*, 200-202.

collaborative spirit also underlies much of his film career. As Glass said in a 2004 interview, "The formula that Hollywood depends on ... you make the movie, then you bring in the composer after the [shooting is done], and then they have three weeks to write the score ... That's the standard in the industry ... I never work that way with anybody."[48] Instead, he prefers a intimate collaborations with filmmakers, often working with them for months.

While Reich and Riley's first forays into film scoring were for experimental shorts, Philip Glass jumped straight into scoring documentaries.[49] In the late 1960s he composed original minimalist film music for Kartemquin Films, and then in the 1970s his music appeared in the art documentary *North Star: Mark di Suvero.* Glass met director Godfrey Reggio in 1981; their long partnership began with the unusual documentary film *Koyaanisqatsi* (1982). After this film's surprising popular success, Glass continued to work with Reggio, but he was in such demand as a film composer that he would score at least one film every year thereafter. For the rest of the 1980s, he continued to compose for more "high-brow" genres such as documentaries, avant-garde shorts, and arthouse features—as he still does—but his music began to find its way into Hollywood. As Glass has quipped, "Early on, I was someone who did art movies ... If you wanted somebody to score a film that nobody saw, that was me."[50] But soon his music was appropriated by

48 Philip Glass, "Philip Glass on Film: Collaboration and Fulfillment," interview with Kurt Nelson, Filmbank, 2004, http://filmbank.org.uk/dev/fiba_2004/glass/fiba_04_philip_glass.html (accessed 9 Jan 2008).

49 Though documentaries including *Koyaanisqatsi* were experimental, these documentaries were much longer than the experimental films with which Reich and Riley began their scoring career.

50 Ellen Pfeifer, " Keeping score Philip Glass has written music for 18 films over 23 years," *The Boston Globe*, 5 Nov 2000, Section L.

commercial film, in the mainstream *Breathless* (1983), and shortly thereafter Glass scored his first Hollywood feature, *Hamburger Hill* (1987). In the late 1980s, Glass met documentarian Errol Morris, and began another long collaboration with *The Thin Blue Line* (1988); their films were very successful at the box office for documentaries, and brought Glass even more opportunities to score film. By 1992, he had scored a mainstream Hollywood horror film (*Candyman*), and by the late 1990s, the composer had definitively arrived as a potent force in popular studio film, with his music being deployed in both a Scorsese movie (*Kundun*, 1997), and the blockbuster Hollywood science-fiction film, *The Truman Show* (1998). After this commercial triumph, Glass turned away from Hollywood studio movies for a few years, until 2002's *The Hours*. Since then, he has continued to write both for smaller productions as well as for mass-market studio films such as *Secret Window* and *Taking Lives* (both 2004).

It is common knowledge that Glass's first minimalist film score was the 1977 *North Star*, but in actuality he began scoring nearly a decade earlier.[51] Glass embarked upon his film career as a minimalist composer in the late 1960s, when he began a relationship with the fledgling documentary maker Kartemquin Films, scoring its 1968 documentary *Inquiring Nuns* and the 1970 *Marco* (the first directed by Gordon Quinn and Gerald Temaner, *Marco* co-produced by the same).[52] Both these films were lightly

51 Glass's first experience with film was not as hired composer but as music editor and transcriber for the 1966 psychedelic film *Chappaqua*. The director, Conrad Rook, hired Glass to transcribe Ravi Shankar's music into Western notation for the film; Glass also ended up composing what he called "modern music" (not minimalist) for parts of the film. Potter, *Four Musical Minimalists*, 257-8; Strickland, "Glass, Philip."

52 "About Gordon Quinn," Kartemquin Films, http://www.kartemquin.com/about/gordon-quinn (accessed 20 Sept 2006); "Films: Inquiring Nuns," Kartemquin Films, http://www.kartemquin.com/

scored; *Inquiring Nuns* contains only one piece by Glass, used multiple times, while *Marco* contains a few more cues.[53] After these first two small scores, Glass—like Reich—concentrated on composing larger works for the concert hall in the early 1970s, writing both *Music in Twelve Parts* (1974) and the opera *Einstein on the Beach* (1976). After a nine-year break from writing for the cinema, he composed his first substantial original score for the 1977 documentary *North Star: Mark di Suvero*.[54] Directed by Francois de Menil, this film presents a sculpture exhibit of its titular artist.[55]

The next project Glass scored with original music became the most commercially successful film with a minimalist soundtrack to this point: *Koyaanisqatsi.*[56] The film, which appeared at festivals in 1982 and was widely released in 1983, was still, however, far from the Hollywood mainstream, as was the working relationship between composer and director. The movie, directed by Godfrey Reggio, is a nonnarrative documentary with a continuous stream of Glass's music that "contrasts placid, panoramic photography of unspoiled nature at its grandest with hyperkinetic scenes of urban life and

---

films/inquiring-nuns/filmmakers (accessed 20 Sept 2006).

53 "Films: Inquiring Nuns 1968," Kartemquin Films, http://www.kartemquin.com/films/inquiring-nuns (accessed 20 Sept 2006); Richard Guérin, Orange Mountain Music, email message to author, 25 Jan 2008; "Films: Marco," Kartemquin Films, http://www.kartemquin.com/films/marco/filmmakers (accessed 20 Sept 2006).

54 "Films: North Star: Mark di Suvero," Philip Glass Official Website, http://www.philipglass.com/html/films/north-star.html (accessed 21 Sept 2006); Tim Page, "Philip Glass Settles Suit on Music in *Breathless*," The New York Times, 19 July 1983, Section C.

55 Janet Maslin, "Film: Quickie King and Man of Steel," *New York Times*, 7 Apr 1978, Section C; "Films: North Star: Mark di Suvero," Philip Glass Official Website, *ibid*.

56 In a bizarre case of Glass's music making it to mainstream children's television before mainstream film, between *North Star* and *Koyaanisqatsi*, the composer wrote several short pieces ("Geometry of Circles," 1979) that were paired with colorful geometric animations for *Sesame Street*. Their only mention in academic literature is the title, see Strickland, "Glass, Philip," and Joseph Roddy, "Listening to Glass (1981)," in *Writings on Glass*, 174. These animations can be seen at "Geometry of Circles," Muppet Wiki, http://muppet.wikia.com/wiki/Geometry_of_Circles.

environmental despoilation."[57] Reggio knew Glass's music and felt he would be ideal to score the film, so he contacted the composer through a mutual friend, screenwriter Randy Wulitzer, in 1981. Glass was initially reluctant, so Reggio convinced him to see a screening of how well his music from *North Star* went with Reggio's images.[58] Glass was entranced, and began working with Reggio in a collaborative fashion for the next several years. According to Glass, he would send Reggio music, the director would use it to cut the film, both would revise their work, and Reggio "would even shoot new material to go with music I had written."[59] This strong partnership between Reggio and Glass is quite different from the traditional Hollywood relationship between director and composer, where the composer gets a final or near-final cut of the finished film and has a few weeks to work on it.[60]

Not only was the director-composer relationship outside the typical Hollywood norm, but the film is as well. With no dialogue and no plot, the film relies on images and music alone. Reggio's style, a montage of images done with effects such as time-lapse photography, owes a great deal to the style of earlier experimental filmmakers such as Bruce Conner.[61] While Reggio's techniques were not particularly groundbreaking in the

---

57 Schwarz, *Minimalists,* 151.

58 Scott MacDonald, *A Critical Cinema 2: Interviews with Independent Filmmakers* (Berkeley: University of California Press, 1992), 397.

59 Glass, *Music by Philip Glass*, 202-3.

60 This non-traditional relationship of film and music, where the music is not simply put in at the end but has a strong role shaping the editing of the film, seems to be fairly common with minimalist scores. Glass also had this relationship with Scorsese in *Kundun*, and Nyman and Greenaway worked this way (see discussion to follow). This adaptation of film to the music, or the music shaping the film, is also true of 1985's *No Man's Land*, which was inspired by Riley's improvisations, and 2005's *The Dying Gaul*, which seems to be built around the preexisting music of Reich; though these films were shaped by the music, the director/composer relationship was not the collaborative one of Glass/Reggio.

61 This is the same Conner with whom Riley worked with on 1976's *Crossroads*. Ann Hornaday, "What's

world of avant-garde cinema, none of those earlier experimental films had been "feature films for general release," as *Koyaanisqatsi* would become.[62]

But while Reggio used avant-garde techniques in a film that reached a wider audience, perhaps because of its success its techniques have now become part of popular culture.[63] According to film author Michael Dempsey, "In contemporary culture, imagery and techniques that at first seem forever avant-garde get swiftly recycled into more commercial forms; MTV, commercials, fashion photography, Hollywood movies, video games suck up practically anything for their own usage."[64] Its time-lapse night-traffic scenes have been copied by car commercials, and "its point-of-view aerial shot from a flying jet bomber turn up in the processed, stupid pseudo-lyricism of *Top Gun*."[65] *Koyaanisqatsi* has since even become an object of parody in mainstream cartoons; an episode of the satire *South Park* (1997) featured a Christmas pageant performance by Glass whose rhythm recalls *Koyannisqatsi*'s initial chant.[66] While the avant-garde film style of *Koyaanisqasi* began to be used more and more after 1983—perhaps because of its success and influence—its musical style began to slip into more mainstream film use

---

Hopi for 'Trite, Boring Film?'," *The Washington Post*, 15 Nov 2002, Section C.

62 Reggio believed the film unreleasable, but Francis Ford Coppola saw the film during post-production and was so excited about it that he put his name on the film as "presenter" and enabled a wider distribution that gained the film both commercial and critical success. Michael Dempsey, "Qatsi means Life: The Films of Godfrey Reggio," *Film Quarterly* 42, no. 3 (Spring 1989): 2.

63 Its success might be due to its resonance with the popular culture of the time. MTV began broadcasting music videos in 1981, a few years prior to the release of *Koyaanisqatsi*. The film's environmental message—a popular cause in the counterculture movement of the 1960s and 1970s—connected with many viewers. According to Dempsey, it "also reportedly became a belated 'head movie' for people, from unreconstructed hippies to New Agers, who like blissing out to lulling music and pretty pictures and don't care about 'meaning.'" Dempsey, "Qatsi means Life," 2.

64 Dempsey, "*Qatsi means Life*," 6.

65 *Ibid.*

66 *South Park*, Episode no. 110, "Mr. Hanky, The Christmas Poo," first broadcast December 17, 1997 on Comedy Central. *Koyaanisqatsi* has also been parodied in *The Simpsons*.

as well. After *Koyaanisqatsi*, the number of minimalist scores began to rise, and the films it is used in gradually began to shift from avant-garde, documentary, and foreign films toward more popular, mainstream Hollywood studio movies.

Reggio and Glass continued to work together, creating the "*Qatsi*" trilogy of *Koyaanisqatsi* (1983), *Powaqqatsi* (1988), and *Naqoyqatsi* (2002), and two short films, *Anima Mundi* (1992) and *Evidence* (1995). All the fruits of their association are nonnarrative documentaries of only film and music, like *Koyaanisqatsi.*[67] This "sameness" of style is perhaps the reason that the other films have not met with the same acclaim, although it is also perhaps because its then avant-garde style is now less striking, having, in the words of one author, "wormed its way into advertising, music videos and other artifacts of American pop culture."[68] While the films might not have been as popular as *Koyaanisqatsi*, Glass and his ensemble have profited from the films in the concert hall, performing live accompaniment to all the films of the *Qatsi* trilogy.[69]

Following *Koyaanisqatsi*, Glass continued scoring for more "intellectual" genres, composing music for three avant-garde shorts, *A Gentleman's Honor* (1983, directed by John Sanborn), *Act III* (1983, John Sanborn and Dean Winkler), and *The Box Theory* (1984, Owen Land).[70] But his music also began to be appropriated by Hollywood. An early and illegal use of his music in a mainstream film occurred in 1983, the same year

---

67 MacDonald, *A Critical Cinema 2*, 398.

68 Hornaday, "What's Hopi for 'Trite, Boring Film?'," *ibid.*

69 Philip Glass, "Philip Glass on Composing for Film and Other Forms: The Case of *Koyaanisqatsi* (1990)," interview by Charles Merrell Berg, in *Writings on Glass: Essays, Interviews, Criticism,* ed. Richard Kostelanetz (New York: Schirmer Books, 1997), 131; "Live Performances," *Koyaanisqatsi* Website, http://www.koyaanisqatsi.com/events/events.php (accessed 25 Sept 2006).

70 "Philip Glass" under "Video Collection" under "Resources," The Kitchen, http://www.thekitchen.org/ (accessed 25 Sept 2006).

Koyaanisqatsi came out in wide release. Glass's piece "Opening" from the album *Glassworks* was used without credit in the film *Breathless*, which led to a lawsuit against Orion Pictures. The film had licensed two minutes of Glass's music to be used incidentally and with no rearrangement; in the final product, the music was used far more extensively, and was reorchestrated. The composer reached a settlement with Orion, receiving tens of thousands of dollars in royalties.[71]

The renown of *Koyaanisqatsi*, however, also brought Glass opportunities to score feature films, the first of which was *Mishima: A Life in Four Chapters* (1985). Though a slightly more traditional film than *Koyaanisqatsi* in that it has narrative, plot, dialogue, and characters, it is still an arthouse film outside of the Hollywood norm; for instance, it was shot using several different filmic styles including color documentary, black and white, and highly stylized color.[72] The music, like the filming styles, is also varied, and distinct from the synth-heavy Philip Glass Ensemble sound of *Koyaanisqatsi*; it switches between string quartet and full orchestra, with the intimate quartet usually accompanying the black-and-white footage. Again featuring an unusually close collaborative effort, this time with director Paul Schrader, the director told Glass to figure out himself where he thought music should go.[73] While *Mishima* was not a mainstream film, its music has been appropriated by popular culture. A reporter for *The Canberra Times* recounts that its main theme "has been judged mellifluous enough to appear in adverts dozens of

71 Tim Page, "Philip Glass Settles Suit on Music in Breathless," *New York Times*, 19 July 1983, Section C.
72 Vincent Canby, "Mishima, a Life of the Japanese Writer," *New York Times*, 20 Sept 1985, Section C; Michiko Kakutani, "Mishima: Film Examines an Affair with Death," *New York Times*, 15 Sept 1985, Section 2.
73 Glass, *Music by Philip Glass,* 203; Glass, "Philip Glass on Composing for Film," 134.

times;" the same theme, "*Mishima*/Opening," has also been employed in the Hollywood studio film *The Truman Show* (1998).[74]

Glass's fame also brought him the opportunity to score his first mainstream Hollywood feature, *Hamburger Hill*. This 1987 Vietnam War movie, directed by John Irvin, made thirteen million dollars at the box office.[75] The film might have been more commercially successful, but it came out a year after *Platoon* and the same year as Kubrick's *A Full Metal Jacket,* both of which were movies on a similar topic.[76] Although Glass is credited as composer for the film, most of the compilation score is made up of 1960s popular music; his contribution totals a bit over six minutes, though it is featured prominently in the opening titles and end credits.

After this first mainstream studio film, Glass returned to composing for documentaries. The year 1988 saw both the second film of the Glass/Reggio collaboration (*Powaqqatsi*) and the first of another fruitful relationship, that of Philip Glass and director Errol Morris. Errol Morris is a documentary filmmaker, but not of the traditional mold; he has been credited with shaking up the genre by "breaking with the tradition of (cinema verité) objectivity."[77] Morris had been working on a film on "Dr. Death," the Dallas psychiatrist Dr. James Grigson, when he met Randall Adams, who had been both convicted of a Dallas cop-killing and sentenced based partly on Grigson's

74 "Melodies in Glass Houses," *The Canberra Times*, 14 Apr 2007, Section A.
75 "Hamburger Hill," "Box Office Film Search Results," *Variety* Online, http://www.variety.com/index.asp?layout=filmsearch_exact&dept=Film&movieID=2232 (accessed 5 Dec 2006).
76 Vincent Canby, "Film: 'Hamburger Hill,' On a Platoon in Vietnam," *New York Times*, 28 Aug 1987, Section C.
77 Philip Gourevitch, "Interviewing the Universe; Errol Morris, whose film 'The Thin Blue Line' saved a man from death row...," *The New York Times*, 9 Aug 1992, Magazine Section, p. SM18.

testimony. Obsessed with Adams's case, Morris conducted a 30-month investigation, during which he filmed interviews with those involved in the case; these interviews, along with stylized reenactments of the events, became the documentary *The Thin Blue Line* (1988).[78]

Like Reggio, Morris knew he wanted Glass's music for his film from the beginning, using temp tracks from Glass's pieces such as *Façade* and *Mishima.* Also following Reggio, Morris piqued Glass's interest in scoring the film by showing him early footage of the project.[79] Unlike the Glass/Reggio project, however, Errol Morris wanted more control over the music, not giving Glass the same freedom or level of give-and-take collaboration. This is hardly surprising, since Morris is a musician himself, having studied cello at Julliard, and even, like Glass, traveling to France to study with Nadia Boulanger.[80] Glass mentioned that "Errol could make musical comments because of his training and he had very specific music in mind that he wanted for each character, though he couldn't hum it to me. As a result there were many rewrites... he will wait you out until he gets what he wants."[81]

Glass partnered with Morris for two more films, each one attaining remarkable

78 Roger Ebert, "The Thin Blue Line," *The Chicago Sun-Times*, 16 Sept 1988, http://rogerebert.suntimes.com/apps/pbcs.dll/article?AID=/19880916/REVIEWS/809160305/1023 (accessed 26 Sept 2006); Errol Morris, "Making History: Errol Morris, Robert McNamara, and The Fog of War," interview with Tom Ryan, *Senses of Cinema* (March 2004), http://www.sensesofcinema.com/contents/04/31/errol_morris_interview.html (accessed 26 Sept, 2006); Gourevitch, "Interviewing the Universe," *ibid*.

79 Errol Morris, "Beyond the Camera," *ibid.*

80 Don Christensen, "Music from T*he Thin Blue Line*: Notes," Philip Glass Official Website, http://www.philipglass.com/html/recordings/music-from-the-thin-blue-line.html (accessed 26 Sept 2006); Philip Gourevitch, "Interviewing the Universe," *Ibid.*

81 Don Christensen, "Music from T*he Thin Blue Line*: Notes," *Ibid.*

distinction for their genre.[82] He also composed music for other directors between his continued films for Reggio and Morris, often documentaries or art films.[83] Then, five years after his first Hollywood film and following years of documentary triumphs, Glass returned to scoring mainstream Hollywood film with his first widespread film success, the 1992 horror movie *Candyman*. Glass had been approached by the director, Bernard Rose, in 1990, and was impressed with Rose's previous film and the *Candyman* story. The studio executives, however, decided there was not enough gore and relieved the director of the project, changing what Glass thought would be a "low budget independent project" into a "low budget Hollywood slasher flick."[84] Though Glass was disappointed with the final result, the film reached a wide audience, making 25 million dollars at the box office."[85] Capitalizing on its popularity, the studio made *Candyman II: Farewell to the Flesh* (1995), and Glass allowed his music from the first film to be used in the sequel.[86] The music Glass created for both films has been described as "Gothic," with church organ, choir, and piano.

Glass's success with films reaching a wider audience had a bit of a hiccup with a

82 They are 1991's *A Brief History of Time* and 2003's The *Fog of War: Eleven Lessons from the Life of Robert S. McNamara,* which won the Academy Award for best documentary; it also earned more than 4 million at the box office, remarkable for its genre. "The Fog of War," *Variety* Online, http://www.variety.com/profiles/Film/main/166201/The+Fog+of+War.html?dataSet=1&query=fog+of+war (accessed 9 Jan 2008); "A Brief History of Time," *Variety* Online, http://www.variety.com/profiles/Film/main/127267/A+Brief+History+of+Time.html?dataSet=1&query=brief+history+of+time (accessed 8 Jan 2008).

83 Examples include the 1989 documentary *Architecture of Transcendence*, directed by Richard Greekberg, and the 1990 unconventional feature *Mindwalk*, directed by Bernt Capra. "Architecture of Transcendence," Art on Screen Database, http://www.artfilm.org/rec-arch.htm (accessed 27 Sept 2006); Vincent Canby, "Reviews/Film; Engaging in Conversation on the Normandy Coast," *The New York Times*, 8 April 1992, Section C.

84 Don Christensen, "The Music of Candyman: Notes," Philip Glass Official Website, http://www.philipglass.com/html/recordings/the-music-of-candyman.html (accessed 27 Sept 2006).

85 Norman Wilner, "The Candyman Can," T*he Toronto Star*, 16 Oct 1992, Section C.

86 Patrick Dillon, "Glass Work Shatter Proof," *The Globe and Mail* (Canada), 17 Jan 1998, Section C.

studio film, *The Secret Agent* (1996), that failed at the box office.[87] But in 1997, a film with a Glass score was released that had all the external trappings of a mainstream Hollywood film: a 28 million dollar budget, a famous director (Martin Scorsese), internationally released, with studio backing.[88] The film *Kundun* was instead, according to critics, "The antithesis of the usual Hollywood biofilm."[89] Like his work with Reggio and Morris, *Kundun* also had an unusual composer/director collaboration; Glass spent 18 months working on the film with Scorsese.[90] While the film might not have gained a wide audience because of its subject matter—the 14th Dalai Lama—it received critical acclaim, garnering numerous Oscar nominations including a nod for Best Score.[91]

Although *Kundun* had some of the accoutrements of mainstream Hollywood film but not the success,[92] the next feature to use his music was a "runaway hit," earning more than 125 million dollars at the box office.[93] *The Truman Show* (1998), a science-fiction tale directed by Peter Weir, has a script by Andrew Niccol, who also wrote and directed

---

87 Its director, Christopher Hampton, had earlier successes with arthouse films like *Carrington*, released the year before with a minimalist score by Michael Nyman, but *The Secret Agent* made less than $80,000. Roger Ebert, "The Secret Agent," *Chicago Sun Times*, 13 Dec 1996, http://rogerebert.suntimes.com/apps/pbcs.dll/article?AID=/19961213/REVIEWS/612130304/1023 (accessed 28 Sept 2006); "The Secret Agent," *Variety* Online, http://www.variety.com/profiles/Film/main/30554/The+Secret+Agent.html?dataSet=1&query=the+secret+agent (accessed 9 Jan 2008).

88 "Kundun," Internet Movie Database, http://www.imdb.com/title/tt0119485/ (accessed 28 Sept 2006).

89 Jay Carr, "*Kundun* wins its quiet gamble on Tibet," *The Boston Globe*, 16 Jan 1998, Section D; Marc Abramson, "*Kundun* and *Seven Years in Tibet,*" *Cineaste* 23, no. 3 (Apr 1998): 8-12.

90 Glass's abiding interest in Buddhism and Tibet, which led to his interest in *Kundun*, also led Glass to score and/or allow licensing of his music for four documentaries on these subjects: *Compassion in Exile* (1993), *Seeds of Tibet: Voices of Children in Exile* (1997), *Oracles and Demons of Ladakh* (2003), and *The Giant Buddhas* (2005). Joe Goldberg, "Invasion of the temp tracks..." *Billboard*, 12 Sept 1998.

91 "Kundun," *Variety* Online, http://www.variety.com/index.asp?layout=filmsearch_exact&dept=Film&movieID=8582 (accessed 2 Jan 2006).

92 *Kundun* only recouped 5.6 million dollars of its 28 million budget. "Kundun," *Variety* Online, *ibid*.

93 James Sterngold, "At the Movies," *The New York Times*, 12 June 1998, Section E; "The Truman Show," *Variety* Online, http://www.variety.com/profiles/Film/main/31668/The+Truman+Show.html?dataSet=1&query=truman+show (accessed 9 Jan 2008).

1997's *Gattaca* (with minimalist score by Michael Nyman).[94] For *The Truman Show*'s music, Weir chose selections from Glass's earlier film work (*Anima Mundi*, *Powaqqatsi*, and *Mishima*) as well as original compositions by both Glass and Burkhard Dallwitz.[95] The score garnered the two composers the 1998 Golden Globe for Best Score.[96]

After the blockbuster popular victory of *The Truman Show*, Glass returned to independent films for several years; he was also commissioned to write a new score to Tod Browning's 1931 classic *Dracula* (1999),[97] and in 2001, Glass himself commissioned four filmmakers to create short films which he then scored ("Shorts," 2001).[98] Then, in 2002, the composer was convinced by a producer to return to scoring a feature film. Director Stephen Daldry had been working on *The Hours* (2002), a film based on the Pulitzer Prize-winning novel of the same name by Michael Cunningham.[99] The film seemed destined for Glass's music from the start: the author of the novel on which the film is based often listened to Glass's music in the morning before writing, and producer Scott Rudin wanted Glass as the composer from the beginning. But they originally did

94 Janet Maslin, "So, What's Wrong with This Picture?" *The New York Times*, 5 June 1998, Section E.
95 Glass also had a cameo in the film playing a musician in *The Truman Show*'s television studio.
96 "Golden Globe Winners," *The Washington Times*, 26 Jan 1999, Section C.
97 Alan Kozinn, "Music Review: Dracula Hears Philip Glass and Gets Thirsty," *The New York Times*, 28 Oct 1999, Section E; Jim Bessman, "Glass Scores `Dracula' For Universal; Will Tour In Support," *Billboard*, 4 Sept 1999.
98 These films included the Reggio/Glass collaborations *Anima Mundi* and *Evidence.* One of the other films is Peter Greenaway's *The Man in the Bath*; Greenaway is noted for his long collaboration with minimalist Michael Nyman. Steve Smith, "Philip On Film: Glass Continues To Score," *Billboard,* 21 Jul 2001; Allan Kozinn, "Music Review; Scores by Philip Glass for Films From Five Countries," *The New York Times*, 28 July 2001, Section B.
99 Stephen Holden, "The New Season/Movies; Get Out Your Handkerchiefs," *The New York Times*, 8 Sept 2002; Matt Wolf, "Holiday Movies; Clarissa Dalloway In a Hall Of Mirrors," *The New York Times*, 3 Nov 2002, Section 2A.

not ask Glass to do the film because, as Daldry complained, "We couldn't afford him."[100] They did, however, use Glass's music as the temp track.[101] Stephen Warbeck, who composed the music for *Shakespeare in Love*, was called in to score the film; his music was rejected, as was Michael Nyman's (the minimalist who scored *The Piano*).[102] Very late in the filmmaking process, the producer showed Glass the film and asked him to write the score.[103] Glass loved the film, remarking "It was a very easy sell," and, as Daldry proclaimed, "eventually agreed to do it for not very much money." Glass produced a lush piano and orchestral score that received an Academy Award nomination for Best Original Score.[104] Reaching a wide audience, the film also made 41 million dollars at the box office.[105]

Though he was convinced at the last minute to do this mainstream movie, Glass continued to score or allow his music to be licensed for documentaries on subjects that interested him, often with political or humanitarian undertones, including *Going Upriver:*

---

100 Michael Cunningham, "Recordings: The Hours: Notes," Philip Glass Official Website, http://www.philipglass.com/html/recordings/the-hours.html (accessed 9 Jan 2008); Wolf, "Holiday Movies; Clarissa Dalloway In a Hall Of Mirrors," *ibid*.; Michael Billington, "Guardian/ NFT interview: Stephen Daldry; Nothing is the Hardest Thing to Do," *Guardian* Unlimited, 12 Feb 2003, http://film.guardian.co.uk/interview/interviewpages/0,6737,898195,00.html (accessed 9 Oct 2006).

101 Jon Burlingame, "Carefully, Glass goes Hollywood; The often controversial composer says he's choosy when it comes to film work. Over the decades he's amassed an impressive body of work. 'The Hours' is his latest," *Los Angeles Times*, 22 Dec 2002, Section E.

102 Jon Burlingame, "Holiday Sneaks; SHORT ENDS; Settling some scores; Join the club, Elmer," *Los Angeles Times*, 3 Nov 2002, Section E.

103 Burlingame, "Carefully, Glass goes Hollywood," i*bid.*

104 A couple of the temp track pieces, selections from *Metamorphosis 2* and *Satyagraha*, were kept in the final score. Burlingame, "Carefully, Glass goes Hollywood," *ibid*.; Billington, "Guardian/ NFT interview: Stephen Daldry; Nothing is the Hardest Thing to Do," *ibid;* Carly Hay, "*Chicago* Leads Oscar Noms With 13," *Billboard*, 22 Feb 2003.

105 "The Hours," *Variety* Online, http://www.variety.com/profiles/Film/main/27594/The+Hours.html?dataSet=1&query=the+hours (accessed 9 Jan 2008).

The Long War of John Kerry (2004) and *Pandemic: Facing AIDS* (2003).[106] But there were two films released in 2004 with Glass soundtracks that were studio Hollywood films with big budgets, stars, and box office success: *Secret Window* and *Taking Lives*. Both are thrillers, Glass's first in the genre since *Candyman* (1992), though neither were wholly scored by Glass; Geoff Zanelli claims to have written about half of the score to *Secret Window*,[107] while Walter Werzowa wrote the title music to *Taking Lives*.[108] Although Glass did reach a mainstream audience with these studio thrillers, he has continued to write for independent films. Some forays have not won popular acceptance, but a 2006 independent project, *The Illusionist*, has defied expectations for a non-studio film; even without studio backing, it has made almost 40 million dollars at the US box office.[109]

Glass continues his prolific film career, scoring both big-budget Hollywood features and smaller, more intimate films.[110] Now, his oeuvre seems to contain more film than "art" music; Glass himself said in 2007, "Until recently, I could say I've written more operas than film scores... but that's changed now. And now I'll never catch back up

---

106 Todd McCarthy, "Going Upriver: The Long War of John Kerry," *Variety*, 15 Sept 2004, http://www.variety.com/review/VE1117924888?categoryid=31&cs=1&s=h&p=0 (accessed 11 Oct 2006); "HBO Documentary Films: Pandemic: Facing AIDS," HBO, http://www.hbo.com/docs/programs/pandemic/synopsis.html (accessed 11 Oct 2006).

107 Geoff Zanelli, "Geoff's Zanelli's Secret Window," under "News," Hans Zimmer Non-Official Website, 19 Mar 2004, http://www.hans-zimmer.com/fr/index.php?anneemois=200403 (accessed 11 Oct 2006).

108 "Taking Lives," *Variety* Online, http://www.variety.com/profiles/Film/main/31271/Taking+Lives.html?dataSet=1&query=taking+lives (accessed 9 Jan 2008).

109 Nicole Sperling, "Tricks of Trade Pay Off," *The Hollywood Reporter*, 23 Sept 2006; "The Illusionist," "Box Office Film Search Results," *Variety* Online, http://www.variety.com/index.asp?layout=filmsearch_exact&dept=Film&movieID=25587 (accessed 2 Jan 2007).

110 Of his two most recent scores, *No Reservations*, starring Catherine Zeta Jones, is of the Hollywood studio type (2007); *Cassandra's Dream* (2008) is a Woody Allen film.

with operas, because opera is slow, and film is fast."[111] With so many scores, some quite commercially successful, his music has now saturated popular culture; mass-market multimedia commonly both uses and fakes his sound. According to Glass, he sends a sampler recording to those who want to license his music for use in advertisements and film scores; "If I deny access to the music totally, I've found that people simply steal it anyway ... either in fact, by taking it off CDs, or in effect, by hiring someone to make a soundalike."[112] This happens so often, *New York Magazine*'s Ethan Smith reports, that "Glass is always involved in at least one lawsuit over the latter practice."[113] His music has been appropriated in commercials, including Scorsese's "TriBeCa" American Express commercial (2004) and PBS's "Red Riding Hood" bedtime story advertisement (2006, still playing in 2007 and 2008), which features music from *The Hours*.[114] Glass's compositions have also been employed in several television shows: the 2005 episode "Valley of Darkness" of *Battlestar Galactica* uses music from the album *Metamorphosis*, while PBS's *Independent Lens* documentary *Enron: The Smartest Guys in the Room* (2005) utilizes Glass's "Knee 1."[115] He was even asked to compose the theme music for an ABC television series, "Night Stalker" (2005).[116] With his work permeating the mass market, Glass's scores have either influenced those of other composers for films such as

111 David Mermelstein, "Concert Composers Practice Economies of Scale," *Daily Variety*, 3 Jan 2007, Special Report, Section A.
112 Ethan Smith, "Is Glass Half-Empty," *New York Magazine*, 18 Jan 1999, http://nymag.com/nymetro/arts/music/pop/reviews/485/ (accessed 9 Jan 2008).
113 *Ibid.*
114 David Edelstein, "On Mean Streets, Paved with Credit," T*he New York Times*, 9 Jan 2005, http://www.nytimes.com/2005/01/09/arts/television/09edel.html (accessed 9 Jan 2008).
115 "Enron: The Smartest Guys in the Room: Film Credits," PBS *Independent Lens* Website, http://www.pbs.org/independentlens/enron/credits.html (accessed 9 Jan 2008).
116 "Night Stalker," Philip Glass Official Website, http://www.philipglass.com/music/compositions/night_stalker.php (accessed 18 Jan 2008).

Solaris, *A Beautiful Mind*, and *Proof*, or they are so familiar to film critics that they invariably label other minimalist-hinting scores as being "Philip Glass-like" (see 2.6).

2.5 Michael Nyman

Unlike Riley, Reich, and Glass, Michael Nyman is not one of the "original" four American minimalists. The British composer studied composition at the Royal Academy of Music in the early 1960s, but, stymied by his distaste for serialism, composed practically nothing from 1964-76.[117] Nyman returned to composition after publishing his book *Experimental Music: Cage and Beyond,* which discussed (among other topics) minimalist music.[118] Though influenced by the American minimalists, Nyman's style differs from theirs as he claims no Eastern influence (unlike Reich's African drumming and Glass's additive process, influenced by exposure to Indian music).[119] The strong bass in Nyman's music is a nod to popular music, and he acknowledges his European heritage with "his clearly directionalized, thumpingly climactic scores, and his familiar, archetypal chord progressions."[120] His music also differs from Reich, Riley, and Glass in that he often uses quotation as the basis of a piece, using composers such as Mozart or Purcell or his own music as sources.[121]

Coming to minimalism later than Riley, Reich, and Glass, Nyman also came to

117 Pwyll Ap Siôn, "Michael Nyman," *Grove Music Online*, ed. L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Oct 2006); Schwarz, *Minimalists*, 196.

118 Michael Nyman, *Experimental Music: Cage and Beyond*, 2d ed. (Cambridge: Cambridge University Press, 1999); Schwarz, *Minimalists*, 196.

119 Schwarz, *Minimalists*, 197.

120 Siôn, "Michael Nyman;" Schwarz, *Minimalists*, *ibid*.

121 Schwarz, *Minimalists*, 200; Siôn, "Michael Nyman."

film scoring later. When he did, it took the form of a long and fruitful collaboration with British director Peter Greenaway, which lasted through 1991. They began with avant-garde short film, but with 1982's *The Draughtsman's Contract* they branched out into arthouse features. With the breakup of their partnership, Nyman's opportunities expanded, and he reached widespread commercial fame with 1993's *The Piano*. The fame earned by this score brought Nyman the opportunity to compose for mainstream Hollywood films, with his first big-budget venture 1997's *Gattaca*. Unfortunately, unlike Glass's triumph with *The Truman Show*, this film and his subsequent Hollywood movies had little commercial success, so Nyman has since returned to scoring arthouse and foreign features.

Nyman's interest in film began when he met Peter Greenaway around 1965. The two first collaborated in the late 1960s, planning a children's cartoon series, *Ganglion*, and working on the 1966 short film *Tree*; however, Nyman's work was not yet minimalist.[122] During the 1970s, when their partnership began in earnest—and Nyman began to write minimalist music—Greenaway was directing short avant-garde experimental films.[123] The director has used structural devices such as numbers since the beginning of his work, and he has said that this dependence on structure and artifice drew him to the American minimalists in the 1960s.[124] Greenaway knew that Nyman had

122 Michael Nyman, "Music and Film: An Interview with Michael Nyman," interview by Larry Simon, *Millenium Film Journal* 10/11 (1981-82): 224; Siôn, *The Music of Michael Nyman*, 83.

123 Paula Willoquet-Maricondi, "From British Cinema to Mega-Cinema," in *Peter Greenaway's Postmodern/Poststructuralist Cinema*, eds. Paula Willoquet-Maricondi and Mary Alemany-Galway (Lanham: Scarecrow Press, 2001), 4.

124 Willoquet-Maricondi and Alemany-Galway, xiv; Jonathan Hacker and David Price, *Take Ten: Contemporary British Film Directors* (New York: Oxford University Press, 1991), 216.

worked with Reich and had an affinity for the style, so in 1975 he asked Nyman to collaborate with him again to provide a musical structure to the experimental film *1-100* (also known as *One to a Hundred*).[125] The title makes the work's subject explicit: the film is the numerals 1 through 100 shot in different locations. Greenaway called on Nyman to "find some musical parallel for this additive arithmetic process and, additionally, to provide a rhythm to edit the numerical sequence to."[126] The multiple piano piece Nyman originally composed for the score paralleled the film by having a 100 chord series that alternates between ascending by perfect fourths and descending by perfect or diminished fifths.[127] Although Greenaway chose not to use this piece for the score for because its mood did not suit the film, he employed another Nyman piece, originally intended for the film *A Walk Through H* (1978), which consists of ten different chords each repeated ten times.[128]

The Nyman/Greenaway composer/director alliance, which continued for a total of 18 works, resembles those of Glass and Reggio or Glass and Scorcese.[129] Standard Hollywood practice involves inserting the score after the film is edited; instead, Nyman would write the music while the film was being shot, and then the music would be used by Greenaway to create the editing rhythm.[130] As Nyman has remarked, "This way round

125 Though begun in late 1975, the film was not released until 1978. Michael Nyman, Sleeve Notes, Decay Music, Obscure Records OBSCD6, http://www.michaelnyman.com/disco/1; Hacker and Price, *Take Ten*, 216; Hacker and Price, *Take Ten*, 216.
126 Nyman, Sleeve Notes, *Decay Music*.
127 Siôn, "Michael Nyman;" Siôn, *The Music of Michael Nyman*, 46.
128 Nyman, "Music and Film," 225.
129 Schwarz, *Minimalists*, 200.
130 With the exception of *Vertical Features Remake.* Nyman, "Music and Film," 227; Russell and Young, *Film Music,* 97.

it meant I wasn't just a dummy who slotted music in."[131] While their director/composer collaboration differs from the mainstream one, it is not the equal partnership of Glass and Reggio. As in *1-100*, Greenaway would provide Nyman with a scenario or structural idea, Nyman would compose music to go with the structure, and then Greenaway would place the music where he saw fit—whether in Nyman's intended place or not (as with his *A Walk Through H* music being used for *1-100*).[132] So athough both film and music were composed according to some particular system, they would not necessarily end up coinciding.[133]

Although Nyman began working with avant-garde film in late 1975, he also tried his hand at scoring a more commercial feature film, *Keep it up Downstairs* (1976, directed by Robert Young); its commercial and critical failure (as well as poor working conditions) convinced Nyman to forgo commercial films for the time being.[134] Greenaway and Nyman joined forces for a few more independently-funded avant-garde shorts, for Greenaway's first feature-length film (the avant-garde mock-documentary *The Falls*, 1980), and then financing by BFI and Channel 4 allowed them to produce *The Draughtsman's Contract*.[135] This 1982 film marks a change in the Greenaway oeuvre from pure experimental avant-garde films to arthouse features; the movie contains some

131 Russell and Young, *Film Music,* 97.
132 Russell and Young, *Film Music,* 97; Nyman, "Music and Film," 227, 230.
133 Nyman, "Music and Film," 224.
134 For the score of this X-rated British sex comedy, Nyman did not compose a minimalist soundtrack, but a more conventional one, arranging a pastiche of Edwardian salon music. Russell and Young, *Film Music,* 97; Verina Glaessner, "Keep it up Downstairs," *Monthly Film Bulletin* 43, no. 504/515 (1976): 102; Nyman, "Music and Film," 223-4; Siôn, *The Music of Michael Nyman*, 185.
135 Willoquet-Maricondi and Alemany-Galway, 4; Brown, *Overtones and Undertones*, 181; Nyman, "Music and Film," 230.

avant-garde elements, but as an Agatha Christie-like mystery it is accessible to a wider audience.[136] The work, which was third in receipts at the box office in England in 1982, brought both Nyman and Greenaway their first commercial success.[137] A Restoration-era sex comedy/mystery, the movie features a draughtsman who is hired to do drawings of an English country house.[138] The twelve architectural drawings he produces are used as Greenaway's structural device, to segment the film into twelve parts.[139] Nyman was asked by Greenaway to compose music to assist with this structure, so he decided to compose twelve pieces that grow in detail in six stages, just as the drawings do. The 17th century English setting of the film suggested using music from that time period as a source, so Nyman turned to Purcell and ground basses; the composer built his "baroque-minimalist" score for the film upon these borrowed ground basses, adding details for each version to accompany the drawings' development over six days.[140] Although Nyman intended his music to align with Greenaway's structure of the drawings as they progressed, Greenaway once again chose to move Nyman's music so that the structures do not completely align.[141] The music that Nyman composed for this film—as would be the case for most of the Nyman/Greenaway films—features the Michael Nyman band, a

136 Avant-garde elements of the film include over-the-top wigs, a living bronze statue, and that the murder mystery is left unsolved. Douglas Keesey, *The Films of Peter Greenaway: Sex, Death, and Provocation* (Jefferson: McFarland & Company, Inc., 2006), 9; Willoquet-Maricondi and Alemany-Galway, 4, 7.

137 Schwarz, *Minimalists*, 200; Willoquet-Maricondi and Alemany-Galway, 7.

138 Vincent Canby, "A Comedy-Mystery Set in England in 1694," *New York Times*, 3 Oct 1982, Section 1.

139 Hacker and Price, *Take Ten,* 190.

140 Russell and Young, *Film Music*, 97; Michael Nyman, Sleeve Notes, *The Draughtsman's Contract*, Charisma CASCD 1158, http://www.michaelnyman.com/disco/9; Brown, *Undertones and Overtones*, 181.

141 Russell and Young, *Film Music,* 97.

group originally formed for the play *Il Campiello* (1976).[142] The band is timbrally distinctive, including strings but also bass guitar and saxophones.[143] Nyman's music for this and the other Greenaway films is customarily quick, motoric, and somewhat abrasive.

For the rest of the 1980s Nyman continued to score short films, documentaries, and arthouse features by Greenaway.[144] The Greenaway features continued to do well; none quite achieved the commercial fortune of *The Draughtsman's Contract*, but that work brought wide exposure for Nyman, and a variety of new film music scoring opportunities arose. Though he was not yet scoring mainstream Hollywood film, he was involved with some more commercial exploits. He composed "additional music" for the 1982 X-rated British feature *Brimstone and Treacle*, which starred rock star Sting (directed by Richard Loncraine).[145] He wrote music for British made-for-TV thrillers, and scored several French arthouse feature films, including two for director Patrice Leconte: *Le Mari de la coiffeuse* (*The Hairdresser's Husband*, 1990) and *Monsieur Hire* (1989).[146]

Though Nyman did branch out to French cinema and TV thrillers in the 1980s, he continued to be the primary film music composer for Peter Greenaway though *Prospero's*

142 Siôn, "Michael Nyman."
143 Michael Nyman, Sleeve Notes, *The Draughtsman's Contract*.
144 Examples include the documentary *The Coastline* (1983), the short film *Death in the Seine* (1988), and the feature films *Drowning by Numbers* (1988) and *The Cook The Thief His Wife & Her Lover* (1989).
145 Siôn, *The Music of Michael Nyman*, 185.
146 British TV thrillers include *Nelly's Version* (directed by Maurice Hatton, 1983) and *The Cold Room* (directed by James Dearden, 1984). "Film: *Nelly's Version*," *Time Out* London, from *Time Out Film Guide 13,* http://www.timeout.com/film/reviews/63215/nelly-s-version.html (accessed 3 Jan 2008); "*The Cold Room*," *Variety* Online, http://www.variety.com/review/VE1117789997.html?categoryid=31&cs=1&p=0 (accessed 25 Oct 2006); Janet Maslin, "Reviews/Film; If a Haircut's Erotic, Marry the Barber," *New York Times*, 19 June 1992, Section C.

Books of 1991.[147] Then, "for various reasons," as Nyman has said, their partnership broke apart.[148] The sundering of their relationship opened up new opportunities for the composer; the next feature he scored was *The Piano*, directed by Jane Campion (1993).[149] This movie was the first with the composer's music to reach a mainstream audience, making over 40 million dollars at the US box office.[150] The director Jane Campion and Nyman's association was—like the Greenaway collaboration—unconventional; Nyman wrote some of the score before the film was finished, and the director used the music as a temp track to edit the movie.[151] Nyman's score recording sold more than 3 million copies, and the score was nominated for a Golden Globe.[152] Quite different from his Greenaway scores, the music for *The Piano* employs a mix of piano and full orchestral scoring rather than the Michael Nyman Band. It is typical of Nyman's earlier work in that it uses repetition and musical borrowing (in this case Scottish folk tunes and Chopin), but possesses a richer, slower, and more lyrical sound than this Greenaway

147 The only Greenaway feature that used a composer other than Nyman from 1978-1991 was *The Belly of an Architect* (1986), which featured music by Glenn Branca and the Belgian minimalist Wim Mertens (author of *American Minimal Music*). Amy Lawrence, *The Films of Peter Greenaway* (New York: Cambridge University Press, 1997), 189-191.

148 Siôn claims it was because Greenaway overlaid Nyman's music with sound effects, obscuring it. William Ellis, "A Chat with Michael Nyman," *American Record Guide*, 1 Mar 1997; Siôn, *The Music of Michael Nyman*, 111.

149 In retrospect, Nyman believes his long association with Greenaway held back his career in the 1980s. Nyman said, "An awful lot of people disliked the Greenaway films and in the business I became untouchable." After *The Piano's* success, "Hundreds of people in the film industry have suddenly discovered that I exist." Mark Prendergast, "The Nyman Factor," *New Statesman & Society* 8, no. 347 (7 Apr 1995): 48; Catherine Applefield Olsen, "Soundtrack & Filmscore News," *Billboard*, 25 Oct 1997.

150 "The Piano," V*ariety* Online, http://www.variety.com/index.asp?layout=filmsearch_exact &dept=Film&movieID=4101 (accessed 2 Jan 2008).

151 Russell and Young, *Film Music*, 100.

152 Michael Nyman's Eclectic Career," BBC News, posted 22 Mar 2004, http://news.bbc.co.uk/ 1/hi/entertainment/music/3550287.stm (accessed 1 Nov 2006); "Biography," Michael Nyman Official Website, http://www.michaelnyman.com/biography_chronology.php?PHPSESSID= da0f0ca5a2e99610d5fc509716b6057a (accessed 1 Nov 2006); Siôn, *The Music of Michael Nyman*, 182.

music, so Romantic that it could be considered only borderline minimalist.[153] Nyman's music for *The Piano* had a far-reaching influence on popular culture, with certain cues being appropriated by advertisements.[154]

With prestige gained from *The Piano,* Nyman received numerous offers from Hollywood, but "they were rescinded," he quipped, "before I got the chance to say no."[155] So he spent a few more years writing scores for arthouse and foreign films such as Christopher Hampton's *Carrington* (1995), for which Nyman would adapt his own S*tring Quartet No. 3*—which itself came out of Nyman's work for the 1989 documentary *Out of the Ruins*.[156] Following the mainstream commercial triumph of *The Piano* and the arthouse success of *Carrington*, Nyman finally got a chance to score his first big-budget Hollywood film: the author/director of *Gattaca* (1997), Andrew Niccol, asked Nyman to write the music for his directorial debut.[157] Niccol used a temp track for *Gattaca* of both Philip Glass and Gorecki's *Third Symphony*; Nyman composed his score with the sound of those pieces as his starting point, and even used the same instrumentation as the

---

153 Michael Nyman, "Interview: The Practically Ravenous Michael Nyman," interview by Dan Goldwasser, SoundtrackNet: The Art of Film and Television Music, 16 Mar 2000, http://www.soundtrack.net/features/article/?id=53 (accessed 1 Nov 2006); Russell and Young, *Film Music,* 100.

154 The cue "The Heart Asks Pleasure First" was used by Lloyds/TSB bank for a 2003 advertisement, and according to Siôn, its sound has then been imitated in other commercials including, in 2005, for the automobile insurance company morethan.com. Siôn, *The Music of Michael Nyman*, 194.

155 Tom Samiljan, " Composer well known before 'Piano' acclaim," *The Washington Times*, 12 Oct 1994, Section C.

156 This is the same Christopher Hampton for whom Glass would score the 1996 *The Secret Agent. Out of the Ruins* was directed by Agnieszka Piotrowska. Bradley Bambarger, "London's Nyman scores with his new `Carrington'," *Billboard*, 26 Aug 1995; Michael Nyman, Sleeve Notes, *The Suit and the Photograph*, EMI Classics 7243 5 56574 2 8, http://www.michaelnyman.com/disco/55.Michael Nyman, Sleeve Notes, *Out of the Ruins*, Silva Screen FILMCD 063, http://www.michaelnyman.com/disco/15.

157 Niccol also wrote *The Truman Show* (1998), which Phillip Glass scored. Catherine Applefield Olsen, "Soundtrack & Filmscore News," *Billboard*, 25 Oct 1997.

Gorecki.[158] While the film might not have been financially successful, it garnered Nyman his second Golden Globe nomination, the same year Glass received one for *Kundun*.[159] Thus by 1997, minimalist music had infiltrated big-budget Hollywood on a number of fronts.

Hollywood continued to court Nyman, and he was approached to score *Practical Magic* (1998), but his music was rejected and replaced by a score by Alan Silvestri.[160] The next year, 1999, Hollywood released two more films with music by Nyman: *The End of the Affair* (directed by Neil Jordan), which reaped the third Golden Globe nomination for Nyman,[161] and the period cannibal Western *Ravenous*, in which Nyman split compositional duties with Damon Albarn of the British band Blur.[162]

After this string of Hollywood studio films in the late 1990s—none of which made as much money as was probably expected—Nyman returned to scoring arthouse film and non-US funded productions in the 2000s. It may have been the lack of a big box-office triumph of a film like *The Truman Show* meant that he received fewer Hollywood offers than Glass did, or it may be that he decided to take a break from the

158 Russell and Young, *Film Music,* 100.

159 Andrew Stewart, "Michael Nyman Changing Hollywood's Attitudes," *Music Week*, 21 Feb 1998.

160 Nyman, "Interview: The Practically Ravenous Michael Nyman"; Nick Joy, "CD Review: Michael Nyman Compilation," *Film Score Monthly* Online, http://www.filmscoremonthly.com/articles/2001/17_Dec--CD_Review_Michael_Nyman_Compilation.asp (accessed 1 Nov 2006).

161 Janet Maslin, "Film Review; When Passion Turns to Poison," *New York Times*, 3 Dec 1999, Section E; "The End of the Affair," *Variety* Online, http://www.variety.com/profiles/Film/main/26421/The+End+of+the+Affair.html?dataSet=1&query=end+of+the+affair (accessed 2 Jan 2008).

162 Matthew Sweet, "Orchestral Manoeuvres; When Britpop Superstar Damon Albarn was Asked to Write the Score..." *The Independent* (London), 28 Aug 1999, Section Features; "Interview: The Practically Ravenous Michael Nyman," *ibid.*

Hollywood studio system.[163] Returning to familiar ground with British independent film, Nyman began a relationship with director Michael Winterbottom, which bore its first fruit with the 1999 arthouse film *Wonderland* and has continued with *The Claim* (2000). Though neither film met with financial success, Winterbottom has continued to use Nyman's music in more recent films, both pre-existing pieces and reportedly a newly composed score for *Genova* (2008, not yet released).[164] In addition to Nyman's arthouse work for Winterbottom, Nyman has since 2000 also written music for a few French features including 2002's *24 heures de la vie d'une femme* and the 2007 *Never Forever* (from the Korean director Gina Kim),[165] as well as the independent arthouse production *The Libertine* (2005, directed by Laurence Dunmore).[166] A British period piece—as were many of the Nyman/Greenaway films—the score for *The Libertine* features a combination of Nyman's post-*The Piano* lyricism and full orchestral scoring and piano, along with a few pieces that sound more like his Greenaway and Michael Nyman Band work.[167]

---

163 He did have one more Hollywood opportunity—he was brought in as the second composer to score *The Hours* (2002), but his score was rejected in favor of one by Philip Glass.

164 Anthony Kaufman, "Michael Winterbottom's *Wonderland*," IndieWire: People, http://www.indiewire.com/people/int_Winter_Michael_000728.html (Accessed 2 Nov 2006)*;* Damon Smith, "A Director Makes His Claim: The American West Fascinates British Director Winterbottom," *The Boston Globe, 22 Apr 2001,* Section D; David Thompson, "Film; Thomas Hardy in a Cloak of Snow," *New York Times,* 7 Jan 2001, Section 2; Siôn, *The Music of Michael Nyman*, 70-1; "Genova" Internet Movie Database, http://www.media-imdb.com/title/tt0791303/fullcredits (accessed 7 Feb 2008).

165 "Filmography," Michael Nyman Official Website, http://www.michaelnyman.com/filmography.php (accessed 3 Jan 2008); "News," Michael Nyman Official Website, http://www.michaelnyman.com/news.php (accessed 3 Jan 2008).

166 Anthony Kaufman, FX Feeney, Beth Pinsker and Matthew Ross, " Eye on the Oscars: The Indies: Outside the System," *Daily Variety*, 5 Dec 2005; Ken Kubernik, "Eye on the Oscars: Music: Michael Nyman, The Libertine," *Daily Variety*, 30 Nov 2005.

167 Such as "The Maimed Debauchee," Michael Nyman, *The Libertine,* MN Records Ltd MNRCD104.

2.6 Minimalist Techniques in Film Music by "Non-Minimalist" Composers

With Glass, Nyman, and other minimalist composers' music breaking into mainstream Hollywood film in the 1990s, film composers took notice and also began appropriating the style for their own use, incorporating minimalist techniques into their scores in selected films. As David Schiff noted in 2001, minimalism is now "an essential component of any film composer's stylistic vocabulary."[168] Composers such as Stephen Warbeck, Cliff Martinez, James Horner, and even John Williams have used either the minimalist style or minimalist techniques in films ranging from arthouse features to major Hollywood blockbusters.

John Williams was one of the first non-minimalist composers to employ minimalist techniques in his film scores. Williams is certainly not usually considered a minimalist; he is famed rather as the composer who brought back the lush, romantic orchestral film score reminiscent of classical Hollywood cinema with George Lucas's *Star Wars* (1977).[169] His music has been called "bombastic," "lyrical," and was labeled by the *Village Voice* as "corny Romanticism."[170] But although much of his film music is unabashedly Romantic and melodic, his skills are not confined to that style; he has used minimalist techniques in two recent mainstream Hollywood studio science-fiction films

168 David Sciff, "Music; Taking Movie Music Seriously, Like it or Not," *New York Times*, 22 Apr 2001, Section 2.

169 Kalinak, *Settling the Score*, 188; K. J. Donnelly, "Introduction: The Hidden Heritage of Film Music: History and Scholarship," in *Film Music: Critical Approaches*, K. J. Donnelly, ed. (New York: Continuum International Publishing Group, Inc., 2001), 13.

170 Jim Sullivan, "Williams delivers pure pomp and melody," *The Boston Globe*, 14 Oct 1999, Section D; Anthony Tommasini, "Emotions of *Sith,* Carried by Score," *New York Times*, 23 May 2005, Section E; Kalinak, *Settling the Score,* 198.

directed by Stephen Spielberg. The first, *A.I.: Artificial Intelligence* (2001) has, for Williams, "an unusually restrained, modernist score."[171] The film, a Pinocchio-like tale about a robot boy who desires to become human for the love of his human "mother," deploys minimalist techniques, often to mark robots (see Chapter Three). Williams would again use minimalism in *Minority Report* (2002). Believing that *Minority Report* should not have "a long lyrical line" or "major melodic voice," the composer used the propulsion of minimalist repetition in several cues including "Minority Report" and "Pre-Crime to the Rescue."[172] Both of these big-budget movies utilizing minimalist musical techniques were a success in the mass market, making 78 million (*A.I.*) and 132 million dollars (*Minority Report*).[173]

But William's work for Stephen Spielberg is hardly the only incidence of minimalism being used in big-budget studio science-fiction films.[174] The same year *Minority Report* was released, the remake of *Solaris* (2002)—directed by Stephen Soderbergh—also featured minimalist techniques in the score by Cliff Martinez.[175] Martinez, famous for his stint as a drummer in the band Red Hot Chili Peppers, has been Soderbergh's "house composer" for most of his "serious" films such as s*ex, lies, and*

---

171 A. O. Scott, "Film Review; Do Androids Long for Mom?," *New York Times*, 29 Jun 2001, Section E.

172 Timothy Mangan, "John Williams: A Lifetime of Noteworthy Achievement," *The Seattle Times*, 28 July 2002, Section K.

173 "A.I.: Artificial Intelligence," *Variety* Online, http://www.variety.com/profiles/Film/main/24267/A.I.+Artificial+Intelligence.html?dataSet=1&query=a%2Ei%2E%3A+artificial+intelligence (accessed 3 Jan 2008); "Minority Report," *Variety* Online, http://www.variety.com/profiles/Film/main/29007/Minority+Report.html?dataSet=1&query=minority+report (accessed 3 Jan 2008).

174 J. Hoberman, "Space Odysseys," *The Village Voice,* 27 Nov- 2 Dec 2002, http://www.villagevoice.com/film/0248,hoberman,40122,20.html (accessed 28 Nov 2006).

175 *Solaris* was made into a 1972 film by Andrei Tarkovsky. Mick LaSalle, "Soderbergh's 'Solaris' is all surface and cold as Kubrick," *San Francisco Chronicle*, 27 Nov 2002, Section D; Robert Koehler, "Solaris," *Daily Variety*, 11 Dec 2002.

videotape (1989) and *Traffic* (2000).[176] Martinez's minimalist bent comes from Soderbergh's taste in music; the director does not like "hummable melodies" and cannot stand bombastic orchestral scores.[177] Martinez's scores for Soderbergh therefore tend to be ambient, atmospheric, electronic, and lacking in melody.[178] But the lack of a melody does not make music minimalist; the score for *Traffic*, for instance, could simply be described as an ambient score in which music occurs a minimal amount of the time. But though *Solaris* does feature some ambient cues, others clearly use minimalist repetitive techniques; thus, the music has been compared to that of both Glass and Reich. One reviewer said the film's trancelike quality "is only emphasized by Cliff Martinez's minimalist Philip Glass-like score," while another critic said the "score may sound to many ears to be too close to the work of living composers Gyorgy Ligeti (made famous by tracks in "2001") and Steve Reich."[179] Musical cues such as those appearing over scenes of the alien planet, Solaris, have made critics proclaim that "minimalistic scores like Cliff Martinez's *Solaris* (one of the year's best)... have gone a long way in developing the style into a distinctively filmic one" (see Chapter Four).[180]

In the 1990s and 2000s, Hollywood composers also began employing minimalist

---

176 Martinez has not scored Soderbergh's more mainstream films such as *Ocean's Eleven* and *Erin Brockovich*. Greg Burk, "Droning Man," *LA Weekly*, 3 Oct 2003, http://www.laweekly.com/music/music/droning-man/2346/ (accessed 3 Jan 2008); David Mermelstein, "*Traffic*'s' sonic identity," *Daily Variety*, 9 Jan 2001.

177 Burk, "Droning Man," *ibid*. Mermelstein, "*Traffic*'s'sonic identity," *ibid*.

178 Burk, "Droning Man," *ibid*; Robyn Flans, "Cliff Martinez," *Mix*, May 2001; Mermelstein, "*Traffic*'s' sonic identity," *ibid*.

179 Mick LaSalle, "Soderbergh's 'Solaris' is all surface and cold as Kubrick," *San Francisco Chronicle*, 27 Nov 2002, Section D; Robert Koehler, "Solaris," *Daily Variety*, 11 Dec 2002.

180 Jason Comerford, "Six Things I've Realized About Film Music: 2002 in Review," from *Film Score Monthly* 8, no. 1, *Film Score Monthly* Online, http://www.filmscoremonthly.com/articles/2003/19_Feb---Jason_Comerford_2002_In_Review.asp (accessed 27 Nov 2006).

techniques in genres besides science-fiction. James Horner is another composer, like Williams, known for his lush, "sweeping orchestral scores" for such blockbuster Hollywood studio films as *Willow* (1988), *Braveheart* (1995), and *Titanic* (1997).[181] The same year Williams used minimalist techniques in his robot science-fiction film *A.I.*, Horner employed them in his score for the biopic film *A Beautiful Mind* (2001). The film, directed by Ron Howard, is loosely based on the life of schizophrenic Nobel-wining math prodigy John Nash.[182] The film was a hit with both critics and the box office, making 170 million dollars and winning four Academy Awards.[183] As for the film score, one film critic noted that "James Horner contribute[d] music that at times sounds like Philip Glass."[184] In particular, in scenes where John Nash is engrossed in a mathematical problem (such as the cue "Cracking the Russian Codes"), the music tends toward minimalism, with the repetitive nature "celebrating the passion of mathematics and patterns" (see Chapter Six).[185]

After Horner used minimalist music over images of an unstable mathematician solving a problem in 2001's *A Beautiful Mind*, composer Stephen Warbeck used minimalist music over images of an unstable mathematician's daughter solving mathematical problems in 2005's *Proof*. Warbeck is perhaps best known for his work for

181 Bruce Westbrook, "Riding the Wave; Celine Dion, lush orchestration bring depth to *Titanic*," *Houston Chronicle*, 25 Jan 1998, Section Zest; Mike Clark, "Brawny *Braveheart*; Historical Epic Pulses with Heroic Passion," *USA Today*, 24 May 1995, Section D.

182 A. O. Scott, "Film Review; From Math to Madness, And Back," *New York Times*, 21 Dec 2001, Section E.

183 "A Beautiful Mind," *Variety* Online, http://www.variety.com/profiles/Film/main/24811/A+Beautiful+Mind.html?dataSet=1&query=a+beautiful+mind (accessed 3 Jan 2008).

184 Kirk Honeycutt, "Movie Review; A Beautiful Mind," BPI Entertainment News Wire, 17 Dec 2001.

185 Elizabeth Abele, "Movie Review; A Beautiful Mind," *Images: A Journal of Film and Popular Culture* 10, 4 Jan 2002, http://www.imagesjournal.com/issue10/reviews/beautifulmind/ (accessed 15 Nov 2006).

director John Madden, such as the popular *Shakespeare in Love* (1998), *Captain Corelli's Mandolin* (2001), and *Proof* (2005). *Proof*, coming a few years after a film with a similar topic (and, according to one critic, "without the biopic backbone or the sentimental payoff of the Ron Howard film and therefore without the easy audience hook"), did not do as well at the box office as *A Beautiful Mind*, but just as the film topics are akin, so too is the music.[186] Like Horner's score, Warbeck's has drawn comparisons to Glass, so much so that one critic noted that Warbeck supplied a "decent imitation of a Phillip Glass score."[187] Another film reviewer mentioned, "the composer's work often takes on the urgent, obsessive mood of Philip Glass music, which represents an apt sonic accompaniment to the ticking of the tormented mathematical minds at the drama's center."[188] But the score is not pure minimalist; while the style can be found in such cues as "Writing the Proof," other cues, including "Hope" consist of neo-Romantic piano music.

Not confined to sci-fi and tales of mathematicians, minimalist techniques have even found their way into a score of a film about mid-life crisis, *American Beauty* (1999). Thomas Newman, *American Beauty's* composer, is known not only for such big-budget Hollywood films as *The Horse Whisperer* (1998), *Erin Brockovich* (2000), and Disney/Pixar's *Finding Nemo* (2003),[189] but for his experimentation and unusual

---

186 "Proof," *Variety* Online, http://www.variety.com/profiles/Film/main/34244/Proof.html?dataSet=1&query=proof (accessed 9 Jan 2008); David Rooney, "Proof," *Variety*, 5-11 Sept 2005.

187 Kirk Honeycutt, "Movie Review; A Beautiful Mind," BPI Entertainment News Wire, 17 Dec 2001.

188 Rooney, "Proof," *ibid*.

189 Anthony Tommasini, "Film; The Great Film Score: Catch It if You Can," *New York Times*, 2 Mar 2003, Section 2.

instrumental combinations.[190] He delivers both in the *American Beauty* score, whose orchestration draws heavily on percussion instruments, especially mallets such as marimba and xylophone.[191] In cues including the opening piece, "Dead Already," Newman uses the minimalist technique of layered ostinati, with no melody. The percussion-heavy score, combined with the numerous minimalist ostinati, evokes both Reich and world music.

2.7 Why Minimalism?

The proliferation of the minimalist musical technique in recent films, sometimes as part of otherwise conventional scores, gives rise to the question of why this has been the case. As Robert Koehler of *Daily Variety* has declared, "This deliberately undramatic, sometimes abstract music marks a risky leap from the Romantic tradition, which still dominates most film scoring."[192] Why make the leap from a style whose conventions are tested and tried? There are any number of potential reasons for the rise of minimalism in scores: the music's popularity outside of film, its use in temp tracks, its difference from convention, the high art status of its composers, and the possibility of a lucrative soundtrack album.

One of the factors leading to the recent prominence of minimalism as film music is its use in temp tracks. Directors cut their film to pre-existing pieces of music (the temp

190 Tommasini, "Film; The Great Film Score: Catch It if You Can," *ibid*; Jon Burlingame, "Spotlight: Thomas Newman," *Daily Variety*, 21 Jan 2000.
191 Burlingame, "Spotlight: Thomas Newman," *ibid*.
192 Koehler, "Less is More: Minimalist music at film forefront," *ibid*.

or temporary track), send the film to the composer, and that composer often produces new music that sounds similar to that on the temp track. A common temp piece for epic fight scenes is Carl Orff's *Carmina Burana*; the use of this piece on the temp track reportedly began after it was employed in the score of *Excalibur* (1981).[193] Its frequent use as a temp composition—and composers copying its sound for the final score—has led to the big orchestral with chorus accompaniment music to fight scenes in many action, fantasy, and science-fiction films, including *Star Wars Episode I: The Phantom Menace* and *Mission Impossible II*.[194] Occasionally pieces from the temp track are deemed better than the newly-composed, so they are used in the final film. This practice has as its most famous exemplar Stanley Kubrick's *2001: A Space Odyssey*, where Kubrick threw out the entire Alex North newly composed score in favor of the temp track (without asking for permission to use one of the temp track pieces, by Ligeti, which led to a lawsuit).[195]

It is suggested that Glass's music has been used on temp tracks by the number of films that have used just a piece or two of his pre-composed music, including *Breathless* (1983), *Condo Painting* (2000), *One Day in September* (2000), *Les Invasions barbares* (2003), *Yes* (2004), *Declaring Genius* (2004), and *Enron: The Smartest Guys in the Room* (2005). The use of Glass's music as temp track is also supported by the number of films for which he was a hired composer which feature previously written pieces, including

193 Jeff Bond, "Trailer Switch," *The Hollywood Reporter*, 15 Nov 2005, http://www.hollywoodreporter.com/thr/crafts/feature_display.jsp?vnu_content_id=1001479709 (accessed 1 Oct 2006).

194 Jeff Bond, "Mission: Impossible 2," *Film Score Monthly*, http://www.filmscoremonthly.com/articles/2000/13_Jul---CD_Reviews_MI2_Big_Kahuna.asp (accessed 16 Jan 2008).

195 Timothy E. Scheurer, "The Score for *2001: A Space Odyssey*," *Journal of Popular Film and Television* 25, no. 4 (Winter 1998): 172-183.

The Truman Show (1998) and *The Hours* (2002).[196] In an interview with *The Guardian*, Stephen Daldry of *The Hours* admits they had used Glass's music as a temp track:

> We tried so hard to put other music on this film, but I kept on going back to Philip. The film seemed to reject certain sorts of music that just supported scenes in a way that you weren't supposed to hear. We kept putting Philip Glass back on.[197]

The director of the *The Truman Show*, Peter Weir, also admitted to using Glass's music as temp track in the liner notes of the soundtrack CD:

> When making a film, I play music constantly during "dailies" — the nightly screenings of the previous day's shooting. I test all kinds of music against the image, searching for the elusive "sound" of the picture...The tracks that seemed to be drawing the most out of the images for me...were those of Philip Glass... With this in mind, I set out to curate a collection of my favorite Philip Glass tracks.[198]

Weir eventually utilized selections from Glass's scores for *Mishima*, *Powaqqatsi*, and *Anima Mundi*, in addition to newly composed music by Glass and Burkhard Dallwitz, for the film. Glass's music was also used—in conjunction with that of Gorecki—as a temp track for *Gattaca*, which Nyman was called to score.[199] Nyman's music has also been used as temp track; the French director Patrice Leconte used music from Nyman's score for *Drowning by Numbers* on the temp track for his film *Monsieur Hire*, which Nyman was then hired to score.[200]

If Glass and Nyman's music occasionally makes the transition from temp track to

---

196 *The Hours* uses parts of *Metamorphosis 2* and *Satyagraha*.

197 Michael Billington, "Nothing is the Hardest Thing to Do," *Guardian* Unlimited, 12 Feb 2003, http://film.guardian.co.uk/interview/interviewpages/0,,898195,00.html (accessed 28 Sept 2006).

198 Peter Weir, Liner Notes, Philip Glass and Burkhard Dallwitz, *The Truman Show*, Milan Records 35850-2, http://www.philipglass.com/music/recordings/truman_show.php.

199 Russell and Young, *Film Music,* 100.

200 Michael Nyman, Sleeve Notes, *Film Music 1980-2001***,** Venture CDVED957, http://www.michaelnyman.com/disco/156.

film, it stands to reason that perhaps sometimes a Glass temp track is replaced by new music by a different composer, featuring music with similar characteristics. Thus films not featuring any music by Glass or the other minimalist composers may feature minimalist techniques because of their creative origin in minimalist temp tracks. Glass himself has noticed the trend of music that sounds like his own in film: "If I deny access to the music totally, I've found that people simply steal it anyway ... by hiring someone to make a soundalike."[201]

If the spread of minimalism in the 1980s and later could be partly due to its presence on temp tracks, one might wonder how such music got onto the temp tracks in the first place. One might also wonder about directors who choose minimalist composers from the beginning to score their films. What is it about the music that draws directors to use minimalist music or minimalist composers in the first place? One reason is sarcastically proposed in a *Canberra Times* article: "In the past couple of decades, a score by Philip Glass's music has become more or less the mandatory sonic decoration for all serious, classy or would-be serious, would-be classy American movies ... for Hollywood he has come to be the provider of instant, spray-on gravitas. Want your movie to look like Quality Product? Encase it in Glass."[202] Why might Glass's music be a marker of gravitas? The association perhaps comes because of Glass's—and the other minimalists'—status as art music composer. Though their music has been included in films that are part of popular culture, to the mass-market public their compositions still

201 Ethan Smith, "Is Glass Half-Empty," *New York Magazine*, 18 Jan 1999, http://nymag.com/nymetro/arts/music/pop/reviews/485/ (accessed 9 Jan 2008).

202 "Melodies in Glass Houses," *Canberra Times* (Australia), 14 Apr 2007, Section A.

stand as part of the high culture establishment, not as popular music. Films employing such a high intellectual capital product acquire a sheen of its status. But there is another possible reason for this "serious" status. Minimalist music was originally associated with avant-garde and arthouse films like *Koyaanisqatsi* and *Mishima.* Glass has continued to score primarily for more "artistic" films, such as *The Hours* and *Notes on a Scandal*. This "classiness" might stem less from the high status of the composers than from the high status of the earlier films employing the minimalist technique. Newer films perhaps employ minimalism hoping to gain from its association with earlier, high cultural status films.

A related reason to the art-music fame of the composer is the potential for a lucrative soundtrack album. Since *Laura* and *High Noon*, filmmakers have been aware of film music's potential both to sell the film and to make additional money apart from box office receipts. Minimalism's potential for commercial success has been evident at least since Nyman's recording for *The Piano* sold over 3 million copies.[203] Glass, with a built-in market for his compositions from his fame in concert music, sometimes has a bigger audience for the score recording than the film had in the theater. "Some of my biggest records have been soundtracks," Glass has recounted, "*Mishima* sold 150,000, even though only a few people saw the *film*."[204] The commercial viability of the minimalist film score makes it more attractive to filmmakers, creating a kind of feedback loop.

A third possible reason for minimalism's incursion into film is its difference from

203 Siôn, *The Music of Michael Nyman,* 182.

204 Joe Goldberg, "Invasion of the temp tracks, or: How the classical record companies learned to stop worrying about why their latest Beethoven cycle wasn't selling and love classical music," *Billboard*, 12 Sept 1998.

conventional scores, as discussed in Chapter One. Glass declared that filmmakers come to him "when they're looking for something a bit different."[205] And the minimalist technique is dissimilar; compared to the dominant model, it is more "audible," and frequently lacks the traditional emotive devices. It may be different, critics contest, but directors still consider it approachable because its techniques are familiar to audiences who grew up with rock. The Who's "Baba O'Riley," Tangerine Dream, Kraftwerk, Underworld, and numerous other techno, trance, and electronica artists were influenced by minimalists; thus, listeners familiar with those musicians are by extension at least passingly familiar with minimalist concepts. As a writer for the *Canberra Times* proclaimed, "Put at its simplest, minimalism is the only kind of classical music which can usually be relied on to sound appealing to the countless millions of people who were raised on rock: it's loud, it's repetitive, it sometimes uses guitars, drums and bass, and your elderly mum would still think it made an awful racket, dear."[206] But its different-but-approachable status might also arise from its similarity to earlier scoring styles. Musical ostinati and motivic repetition have frequently been used in film, often as a marker of tension; one familiar example is the "Flight" cue that accompanies Marion Bates in her car as she drives away with stolen cash in Herrmann's score for *Psycho* (1960).

While its use in temp tracks, high cultural status, potential lucrative soundtrack recordings, and difference from convention while still being familiar are all possible

---

205 Lynden Barber, " Glass Reflects on Music So Out-There It's In," *The Australian*, 13 Jan 2000, Section Local.

206 "Melodies in Glass Houses," *ibid*.

reasons for the use of the minimalist technique in film scores, I propose that its spread is also due to directors being drawn to minimalism because, both through its musical characteristics (as expressed in both academic and popular criticism) and prior use in other films, it has begun to acquire symbolic meanings: it is becoming a trope. Filmmakers employ minimalism because of what it can *mean*, meanings that are—as those of the conventional score have—on their way to becoming enculturated. The next five chapters will discuss the meanings it has acquired and how they intersect with the musical characteristics of minimalism.

CHAPTER THREE
MINIMALISM AND THE MACHINE

3.1 Introduction to Chapters Three through Five

Music is often used in film to signify alterity. As discussed in Chapter 1, Far Eastern cultures have been marked with Orientalist pentatonic clichés (see Example 3.1), while Native Americans are frequently associated with 4/4 drum beats with accent on beat 1 (Example 3.2).[1]

Example 3.1: Orientalist pentatonic cliché

Example 3.2: Native American cliché

The use of these stereotyped elements musically marks an ethno-cultural Other to the Western norm that dominates most Hollywood film. But not only melodic or rhythmic clichés, but entire musical *styles* outside the late-Romantic norm of the classical Hollywood film score can be employed to signify alien-ness—one that is not simply non-Western or exotic, but altogether inhuman.

Science-fiction and horror films in particular have a long "tradition of expressing

1 See Chapter Five for further discussion of these clichés. Example 3.1 was taken from the opening "Anything Goes" sequence of *Indiana Jones and the Temple of Doom*, while Example 3.2 is a realized version of the cliché Gorbman details in her article "Scoring the Indian: Music in the Liberal Western," in *Western Music and Its Others: Difference, Representation, and Appropriation in Music*, eds. Georgina Born and David Hesmondhalgh (Berkeley: University of California Press, 2000), 235.

futurist/alien themes through use of dissonance and/or electronic sounds."[2] The alterity of these musics can be understood as emanating from their difference from the conventional idiom of the classical film score. Even when electronic or atonal sounds are used within a predominantly Romantic score, they are understood as signifiers of something frightening because of their musical characteristics: unrelieved, non-tonal dissonance and unfamiliar sounds. Minimalism has likewise become a signifier of alterity, but its intrinsic musical attributes make its meaning different from that of atonal musics. Its alien-ness also derives from its divergence from the conventional score; but while atonality's dissonance signifies something terrifying, minimalism's musical features do not automatically register a meaning of fear. Its deviation from the Romantic norm—in combination with its specific characteristics—allows the minimalist technique to signify a diverse collection of Others that will be discussed in Chapters Three, Four, and Five: the machine, the alien, and the non-Western Other.

3.2 Introduction to Minimalism and the Machine

Rebecca Leydon, in her "Toward a Typology of Minimalist Tropes," was one of the first scholars to discuss the associations that minimalism has acquired.[3] Her article, while aimed at the meanings suggested by the qualities of the music itself and not towards those generated by its combination with image as in film, is a useful starting point for a discussion of the signification of minimalist music in film. Leydon mentions

2 Philip Hayward, "Sci Fidelity—Music, Sound, and Genre History," in *Off the Planet: Music, Sound and Science Fiction Cinema*, ed. Philip Hayward (Bloomington: Indiana University Press, 2004), 24.
3 Leydon, "Toward a Typology of Minimalist Tropes."

that minimalist techniques have often been interpreted as "an outright *loss* of subjectivity."[4] This loss of human subjectivity is frequently linked with the Otherness of the machine.[5] Leydon notes that minimalism's "undifferentiated riffs" can suggest something "will-less" or "automatized"; what is more automatized, will-less, and lacking subjective experience than a machine?[6] This reading can be traced back to early critical reviews of minimalist works such as Steve Reich's *Drumming*, which German critic Clytus Gottwald compared to "dehumanized assembly-line labor."[7] A *New York Times* critic, Donal Henahan, also suggested the connection of minimalism and technology when he said of a Reich concert, "granted the pleasure of knowing humans are doing the job one wonders nonetheless if they really need bother, when machines can do it so much better."[8] For these critics, minimalism is either performed in a mechanical manner, or might as well be because of its musical attributes.

Why might minimalism (both the music and its performance) be linked to the machine? Rebecca Leydon might describe minimalism connected with the technological as an example of her "motoric" trope of minimalism, "where musematic strategies evoke an 'indifferent' mechanized process." This elicits a "mechanized or 'automatized' subject

---

4 Leydon, *ibid*.

5 Robert Fink notes and critiques this common reception of minimalism in his dissertation. Robert Fink, "Arrows of Desire: Long-Range Linear Structure and the Transformation of Musical Energy" (Ph.D. diss., University of California at Berkeley, 1994), 224-230.

6 Leydon, *ibid.*

7 Clytus Gottwald, "Signale zwischen Exotik und Industrie, Steve Reich auf der Suche nach einer neuen Identität von Klang und Struktur," *Melos/Neue Zeitschrift für Musik* 1 vol. 1 (1975): 3-6. Quoted in Beate Kutschke, "Avantgarde-Musik der USA aus bundesdeutscher Sicht um 1970: Personalism versus Subjektphilosophie," *Archiv für Musikwissenschaft* 61, no. 4 (2004): 275-299.

8 Donal Henahan, "Steve Reich Presents a Program Of Pulse Music at Guggenheim," *New York Times*, 9 May 1970.

lacking the kind of subjective agency normally attributed to animate beings."[9] Only briefly mentioning how or why this effect might be produced, Leydon suggests that this motoric meaning may occur when the repetition is mechanically produced, such as by the physically-swinging microphones of Reich's *Pendulum Music*, or by works that eschew telos.[10]

While Leydon suggests telos-lacking repetition is what leads to a meaning of mechanization, Robert Fink, in *Repeating Ourselves*, declares that minimalism may indeed possess teleology, though not of the classical norm. According to Fink, the "recombinant teleology" of minimalist repetition may simply occur outside the normal human time-scale, and it is perhaps because of this it is "constantly imagined as the music of machines, androids, and cyborgs."[11] But what does teleology—either lacking or inhuman—have to do with film music? And is it really minimalism's "inhuman teleology" that gives rise to its association with machines and robots? In film, excepting of course music-films like *Koyaanisqatsi* and *Fantasia,* music is not typically used for exceedingly long spans. As mentioned in Chapter One, minimalist music does often lend itself to longer segments than those available to classical Hollywood film scores, but rarely does it last more than a few minutes—is this long enough for "slow" teleology to be an issue? Classical Hollywood scores themselves often have very short musical segments, lasting sometimes only a few seconds. Such short segments do not require teleology in the traditional musical sense; they may not include cadential material. But

9 Leydon, *ibid.*
10 Leydon, *ibid.*
11 Fink, *Repeating Ourselves*, 45.

the goal of film music is not simply a musical one, but a musico-visual one; it does not matter if the music has or does not have musical goal-directedness so long as it works well with the images.

So musical teleology is not necessarily a goal or the goal of film music. But minimalist music in film is still used to represent the technological. Though recombinant teleology may be one factor influencing this representation, it is not the only, nor the most obvious reason. It is certainly not because of actual, mechanically produced repetition as in *Pendulum Music*. I would suggest that minimalism is used in film to represent machines not simply because of a lack of or an inhuman teleology, but because of other characteristics intrinsic to the music itself.[12] Minimalist music has a regular, steady pulse. It is not melodically based, but repetition-based. It also typically has limited dynamic contrast. All of these musical attributes are also characteristics of the working of machines, be they manifested in sound, visually observed motion, or internal process. Minimalism, then, can function as an *iconic sign*.[13] The characteristics of the music itself—quasi-onomatopoeically—suggest a signification.[14] What follows is a discussion of how three films use minimalism as an iconic sign for the Other of machine: for mankind as machine, for cyborg, and for android.

---

12 Characteristics besides its possible inhuman teleology.

13 According to Pierce's theory, an icon in some way resembles or is similar to its signified object. Eero Tarasti, *Signs of Music: A Guide to Musical Semiotics* (Berlin and New York: Mouton de Gruyter, 2002), 11; Raymond Monelle, *Linguistics and Semiotics in Music* (Philadelphia: Harwood Academic Publishers GmbH, 1992), 197.

14 Minimalist composers are quite aware of minimalism's possible onomatopoeia with the machine, and have taken advantage of this attribute in concert hall and film musics. In parts of Reich's *Different Trains* and in Glass's "Train to Sao Paulo" cue in *Powaqqatsi*, the music clearly sounds nearly identical to a train. In Glass's cue, it is even synchronized with the motion of a train shown on screen. This film is not discussed in depth in this section because its signification is so obvious—the music is no longer symbolic, but essentially replaces diegetic sound effects.

3.3 *Koyaanisqatsi*

The logical place to begin with a discussion of what minimalist music may signify in film is with the first film with a minimalist soundtrack to reach a mainstream audience, *Koyaanisqatsi* (1982). Though not all of Philip Glass's score can be interpreted this way, the movie has a section called "The Grid" (sequence begins at 44:11) that associates minimal music with the machine.[15] Through man's association with technology—both visually and musically—it also suggests a loss of subjective experience and the dehumanization and mechanization of mankind.

In "The Grid" (the following examples begin at 51:42), shots or scenes of machines working are intercut with scenes of humans, all set to the same music. The scenes featuring people usually also involve some machine, be it an assembly line or sewing machine. Example 3.3 shows a succession of these scenes in "The Grid," with a description of what is occurring in each segment.

Example 3.3: Intercut human/machine scenes from "The Grid"

Time	51:42	51:47	51:58	52:07
Scene	cars/traffic	people going through revolving door	traffic/people crossing street	people moving up subway escalator

Time	52:23	52:43	53:04	53:16
Scene	hot dog & baloney machine	mail-sorting machine/people sorting	woman making jeans with sewing machine	people working on TV assembly line

15 Timings, given in hours:minutes:seconds (or just minutes:seconds, as appropriate) are the timestamps given by the author's DVD player(s). They may vary slightly based on a DVD player's model.

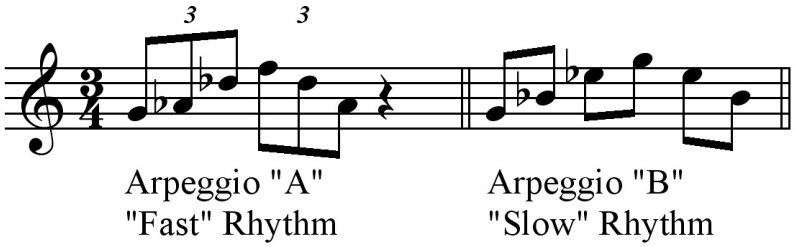
The humans in these scenes are not presented as subjects, with individual feelings and purposes. They do not speak—the film has no dialogue—or show emotion on their faces, they simply move, just like (and with) the machines, as if programmed automatons. The filmic juxtaposition of shots of human and the technological draws a similarity or comparison between the two, and the similarity is drawn closer since the humans are seen as working with and—lacking emotions or other signs of individuality—being just another part, an appendage, of the machines themselves. The humans shown are no longer autonomous, having become alienated in the modern industrial capitalist world. Ceasing to be subjective creatures, they have simply become cogs of the industrial machine. This alienating mechanization effect is furthered by the time-lapse photography: the activity done by humans is sped up to an inhuman level, to a speed that only a machine could handle.

But it is not simply the visual juxtaposition of images or time-lapse photography that draws together human and machine in "The Grid"; the music furthers this interpretation. The music over these scenes is continuous, and does not change markedly when there is a cut to a human or from a human to a machine; it is indifferent to whether the image is human or technological.[16] The lack of real musical differentiation between shots of humans and shots of machines can be seen by examining the relationship of musical materials to visual shots. In the section from 51:42 to 52:22, the music uses the

16 The music is minimalist, and so by definition, the rate of real change is slow. So discussing that the music does not distinctively change over a span —marking human and machine as different—might seem unnecessary. But minimalist music does have small changes, switching rhythms and chords. This discussion intends to show that even these small musical changes do not differentiate human from machine.

same instrumentation (flute, saxophone, and synthesizer in unison), so timbre does not mark human or machine as different. The music also uses the same two ordered pitch collections, Arpeggio "A" and "B" (see Example 3.4, these are repeated as shown in Example 3.5), and the same two rhythms—the "Fast" triplet rhythm and the "Slow" eighth note rhythm as shown in Example 3.4—to portray both human beings and mechanical devices (see Visual Shots in Example 3.5). Though either the arpeggio or rhythm (or both) change with the visual shot, they also change within the shot; therefore, these changes do not mark either "human" or "machine" in a distinctive way.[17]

Example 3.4[18]: Pitch and rhythmic content from 51:42-52:22 in *Koyaanisqatsi*



Example 3.5: Conjunction of pitch and rhythmic material with images in 51:32-52:22

Arpeggio	A	B	A	B	A
Repetitions	8	6	6	8	8
Rhythm	Fast	Slow	Slow	Fast	Fast
Start Time[19]	51:42	51:47	51:52	51:57	52:02
Visual Shot	cars/traffic	people/revolving door		traffic/people crossing street	

17 The close, interactive relationship between the music and the visual cuts is an artifact of the close collaboration between composer and director; see Chapter 2.4.

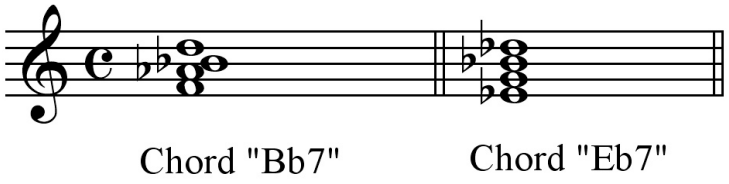
18 Accidentals continue through the measure. This musical example and all others in this dissertation are original transcriptions by the author. Details like time signatures and durations may not precisely match the written score, but are how the music was perceived by the author. The examples are not intended to reproduce all musical details, but show those relevant to the discussion.

19 "Start Time" is the start time of the chord/rhythm combination. In certain cases, this does not line up with the shot and this is reflected in the chart's visual shot row (as in Example 3.8)

Arpeggio	B	A	B
Repetitions	6	6	8
Rhythm	Slow	Slow	Fast
Start Time	52:07	52:12	52:18-52:22
Visual Shot	people going up subway escalator		top of escalator/people going up

The lack of distinctive change between human and machine shots is even more obvious in the following part of "The Grid," from 52:22-53:55. The instrumentation has changed from the prior section; there is still saxophone and flute on the "fast" and "slow" rhythms from Example 3.4, but now these use the "Bb7" and "Eb7" pitch collections found in Example 3.6. Replacing the synthesizer, a vocal ensemble uses the pitch collection of Example 3.6 and the rhythms of Example 3.7. This new instrumentation is continuous from 52:22-53:55, so again, instrumentation changes do not mark a difference between human and machine. As one can see by examining Example 3.8—which shows the correlation of image and musical events—this new section begins like the old one; there are musical changes, both in pitch content and rhythm, on visual cuts. But there are also musical changes within a shot, so musical changes do not provide a distinctive difference between shots of machines and shots of humans. Neither human nor machine is specially marked out with a particular "chord" or rhythm; both humans and machines use both pitch collections found in Example 3.6, and both also use the rhythms of Example 3.7. Near the end of this section, visual cuts and musical changes become desynchronized, making moot any kind of musical distinction between the different images.

Example 3.6: "Chord" or pitch collection content of 52:22-53:55[20]



Example 3.7: Simplified rhythmic content of 52:22-53:55[21]

Example 3.8: Correlation of musical/visual events in 52:22-53:55

Vocal Chord	"Bb7"	"Bb7"	"Eb7"	"Eb7"	"Bb7"	"Bb7"
Repetitions	4	4	4	4	3	4
Rhythm	1	2	2	3	1	3
Start Time	52:23	52:29	52:33	52:38	52:43	52:46
Visual Shot	hot dog machine		baloney machine—near musical synchronization		people working with mail sorting machine	

Vocal Chord	"Eb7"	"Eb7"	"Bb7"	"Bb7"
Repetitions	2	3	3	3
Rhythm	3	1	3	4
Start Time	52:52	52:54	52:57	53:02
Visual Shot	mail-sorting machine/pan R to people		mail-sorting machine	machine stamps mail--synchronized with music

20 This music is not tonal in the traditional sense, so these Mm7 chords are not functional (though Bb7 might seem to point toward Eb7 in a V-I relationship, that chord is a Mm7 that never resolves) ; however, the use of these symbols does accurately represent the pitch content in an way that is more meaningful than some arbitrary symbol. Their non-functional nature is why I have put them in quotation marks. Note: the vocal ensemble performs this pitch content in a more spread-out voicing.

21 These rhythms might not be the actual rhythms of the score for each vocal part (i.e., it may be that different parts sing in hocket), but represent the aural effect of all the vocal parts when heard together.

Vocal Chord	"Bb7"	"Eb7"	"Eb7"	"Bb7"	"Bb7"
Repetitions	4	2	3	3	3
Rhythm	1	1	3	3	4
Start Time	53:04	53:09	53:13	53:16	53:20
Visual Shot	jeans seamstress/sewing machine		seamstress's hands /sewing machine		tv assembly line/people

Vocal Chord	"Bb7"	"Eb7"	"Eb7"	"Bb7"	"Eb7"
Repetitions	4	2	3	5	3
Rhythm	1	1	3	3	1
Start Time	53:23	53:25	53:31	53:34	53:40
Visual Shot	...	different tv assembly line/people		financial data entry people/machines	

Vocal Chord	"Eb7"	"Bb7"
Repetitions	4	5
Rhythm	3	3
Start Time	53:43	53:49
Visual Shot	... people fixing a machine—perhaps a copier or computer	hot dog machine/people working with it

Not only does the music's continuity and lack of distinctive change marking a difference between human and machine enhance the connection between the two, but so do elements of the music itself. The music has numerous machine-like qualities, and, used over images of humans, it imprints them with the same qualities. For example, the instrumentation includes the synthesizer, an electronic instrument. The music has a constant pulse that is mechanically precise. It blazes by at a *vivace* tempo, around M.M. 190, correlating with the time-lapse film. At this tempo, the arpeggios from Example 3.4 are inhumanly fast. The Philip Glass Ensemble must be able to play at least a simulacrum of this music, since they perform live along with the film on tour, but from personal experience I can assert that after only a few reiterations of the arpeggios on the

keyboard at this tempo, one's hand and wrist are exhausted.[22] The saxophone and flute double these arpeggios—fiendishly difficult at this tempo—and their playing is continuous. One can never hear the performers take a breath; this bodily aspect has been removed from the soundtrack. Breath-less and incredibly precise, errorless performance at this tempo is either humanly impossible, or would make the performer seem like a machine.[23] And this is precisely the effect noted by *New Yorker* critic Alex Ross, who writes: "During the twenty-minute frenzy titled "The Grid"... Glass and his musicians become manic machines, firing off notes like so many 0s and 1s.[24] In addition to the instrumentals, the vocals also take on a mechanical quality. A vocal element would customarily bring a human quality to a score, but this vocal ensemble is wordless (singing on a syllable like "da"), and is used simply as another instrument. What could have been a humanizing element is instead neutralized, instrumentalized.

But it is not only tempo and instrumentation that give a mechanical quality to the music of "The Grid"; the music is repetitive, as are the mechanical and human actions shown visually (see "Repetitions" in Example 3.5 and Example 3.8).[25] There is

---

22 "Film, 'Koyaanisqatsi,' With Live Music," *New York Times*, 21 Feb 1988, Section 1.

23 I would refer again to a quote from Donal Henahan, "granted the pleasure of knowing humans are doing the job one wonders nonetheless if they really need bother, when machines can do it so much better." Donal Henahan, "Steve Reich Presents a Program Of Pulse Music at Guggenheim," *New York Times*, 9 May 1970.

24 Alex Ross, "Sound and Vision: Glass's 'Koyaanisqatsi' and the Art of Film Scoring," *New Yorker*, 27 Jun 2005, 102-4.

25 A close examination of the repetitions in Examples 3.5 and 3.8 shows an unusual feature. While they start fairly regularly—only repetitions of 6 and 8 times in Example 3.5—the number of repetitions get progressively more erratic. Example 3.8 shows a section that begins with quadruple repetitions for each chord; this soon disintegrates, with a switching between 4, 2, 3, and 5 repetitions with no discernible musical pattern. Though there seems to be no musical pattern, these repetitions are initially connected with every other visual cut, only to become desynchronized at the end of this example. What might this increasing irregularity in music and image mean? Perhaps it could be read as supporting the film's

practically no dynamic shading. These qualities—steady, inhumanly fast tempo, lacking emotional dynamic shading, and repetition—are all characteristics of the assembly-line machines shown, they are iconic signifiers of machines; the same music over images of humans also imbues them with the same mechanical qualities.

One more element of the music—in combination with the image—draws closer the tie of music and the technological: mickeymousing. At 52:33, the music's pulse is near-synchronous with the actions of the baloney packaging device. Then at 53:02, the pulse is synchronized perfectly with the swinging arm of the mail-stamping apparatus. The music becomes practically a sound effect of the actions of the machine, inexorably linking the two.

Thus "The Grid," though its images, music, and combination of the two, associates human with machine. The visual juxtaposition of machine and human images connects the two, and the time-lapse photography speeds up human activity to a machine-like level. The music is indifferent to whether the image is a human or machine, equating them, and elements of the score's tempo, instrumentation, and repetition are iconic signifiers of machines. The music, also used over human images, imparts to them its mechanized qualities. By this equation of human and the mechanical, "The Grid" suggests a loss of subjectivity on the part of mankind. In *Koyaanisqatsi*, it is not simply the machines marked as Other, but the humans themselves that have become machines.

---

premise, that the world is “out of balance.” A completely musically regular repetition scheme might suggest that this association of human and technology is natural, balanced, or perhaps that the fusion between the two is complete. But this is not the director's message; having the repetitions of the music fall out of balance supports Reggio's aim that this mechanization is unnatural.

3.4 *The Terminator*

This association of minimalism and machines is not limited to the correlation of man with machine as in *Koyaanisqatsi*. Recalling Fink's observation (cited above), minimalism is not just "constantly imagined as the music of machines" but as that of "androids, and cyborgs" as well.[26] The use of minimal techniques as iconic sign for the last term in Fink's trio appears in the score for the industrial dystopia science-fiction/action film *The Terminator* (1984).[27] In *The Terminator*, a cyborg from a future controlled by machines who have set out to eliminate all humans travels back in time to kill the mother of a human resistance leader before she conceives the child. To defend the mother from the cyborg, the resistance movement sends back a man, who becomes the father of that future resistance leader.

The score, by Brad Fiedel, is quite unusual (at least from a 2008 perspective) for an action film. Action films in the 1990s and 2000s (like *Jurrasic Park* or *The Rock*) typically employed loud and robust orchestral scores following the model of the classical Hollywood film score, often combined with popular songs; these scores often mark the protagonist with heroic music.[28] Fiedel's score, on the other hand, is primarily

---

26 *Ibid.*, 45.

27 A cyborg is a human body whose natural processes have been at least in part taken over by machinery; in the case of the terminator cyborg, the body looks human, but only its outside (skin and hair) is organic. The inside is all machine.

28 These scores could have synthetic instruments, but such instruments are intended to sound like "real" ones or are blended so well in the mix as to be indistinguishable. Yair Oppenheim, "The Functions of Film Music," *Film Score Monthly* Online, http://www.filmscoremonthly.com/features/functions.asp (accessed 15 Apr 2007); Jason Foster, "Ten Composers Who Have Made the Most of This Decade: The Stunning Conclusion," *Film Score Monthly* Online, 8 Apr 1999, http://www.filmscoremonthly.com/articles/1999/08_Apr---Ten_Composers_Who_Have_Made_the_Most_of_the_Decade.asp (accessed 15 Apr 2007); Todd McCarthy, "What's the Film Score: Loud and Overblown," *Variety* Online, 3 Dec 2002,

synthesizer-driven.[29] Instead of heroic music, its main focus is on portraying the mechanical elements of the film, for which this instrumentation choice works well: a synthesizer *is* a machine, and by its novelty is marked as sounding "artificial" or "unnatural."

But synthesized or electronic music, though it often signifies futuristic settings or Otherness, does not *have* to portray the mechanical aspects of robots. Synthesized/electronic scores have made their way into other films featuring cyborgs or androids; a famous example is Vangelis's synth score for *Blade Runner* (1982), but more recent films including *Star Trek: First Contact* (1996), have also employed electronic resources to portray cyborgs. But the use of electronic music is quite different in each of these scores, highlighting the features of the cyborgs/androids in each film that the composer/director found most important to communicate. In *Blade Runner*, the androids, called "Replicants," are completely organic, though synthetic. The Replicants are presented as having emotions, and are nearly indistinguishable from humans, both in mind and body. Vangelis's score emphasizes their humanness: organic, heartbeat sounds often accompany Replicants in distress. Organic heartbeats occur when a Replicant is being tested for emotional response (6:40), and when one of the female Replicants is being chased and then shot (57:41-59:24). Further emphasizing their human-like nature, jazzy synth music accompanies images of the female Replicants. Jazz music, a cliché for

---

http://www.variety.com/article/VR1117876844.html?categoryid=5&cs=1 (accessed 15 Apr 2007).

29 The synthesizer was quite popular in pop music of the time, which in synthpop, techno, and industrial often had robotic-sounding, repetitive motifs. While the elements of the score I will be discussing could be possibly be classified as perhaps some sort of techno/industrial, they fit my definition of minimalism as described in Chapter One.

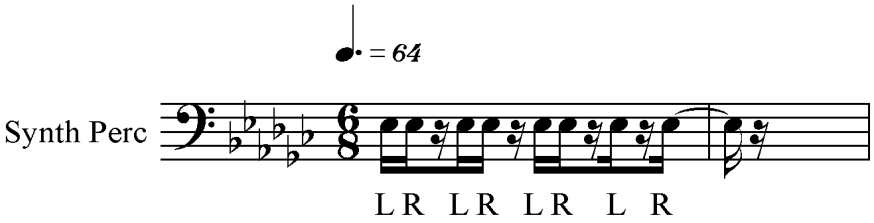
the femme fatale in noir detective thrillers, insinuates the female Replicants' sensuality (again 57:41-59:24, 1:01:24).

While Vangelis's music emphasizes the humanity of androids in *Blade Runner*, in *Star Trek: First Contact*, the composer Jerry Goldsmith emphasizes the insect-like qualities of cyborgs with electronic music in his score. The villain "Borg" are a menacing, partly-organic hive-mind. They capture other species and forcibly assimilate them, making them cyborgs and part of the Borg collective. While most of Goldsmith's score for the *First Contact* is orchestral—typical of the *Star Trek* film franchise—on several occasions he marks the Borg with synthetic insect-like sounds combined with unintelligible electronically processed vocal snippets (2:50-3:54, 23:29-23:38). This musical choice emphasizes the hive-mind nature of the Borg.

Where Vangelis used electronic music to emphasize the humanness of Replicants, and Goldsmith employed it to portray the insectoid qualities of the Borg, Fiedel chose to use synthesized music to portray the mechanical, relentless, emotionless nature of a cyborg that looks outwardly human. He accomplished this effect by employing minimalist techniques. The title music of the film, the "Terminator Theme," is an example of how Fiedel uses minimalist techniques as an iconic sign for machine. The "Terminator Theme" begins (at 1:46) with a synthetic, hollow, metallic-sounding percussion rhythm, shown in Example 3.9; such a sound is obviously constructed or technologically altered, not having the cultural connotation of organic-ness or naturalness

that orchestral instruments—by virtue of their familiar sound—have acquired.[30] The "L" and "R" below the rhythm of Example 3.9 indicate from which side speaker each note emanates in the score of the DVD release. This speaker alternation—though it occurs only on the DVD, not the original monophonic theatrical release—furthers a constructed, mechanical interpretation; this switching is only possible with new audio technology.

Example 3.9: Percussion rhythm of the "Terminator Theme"



This rhythmic cell repeats, without rhythmic variation, for the entirety of the title theme (until 2:54).[31] Its incredible, inhuman precision and unvarying nature make it seem robotic. Both the metallic timbre of this rhythm, as well as its minimalist, obsessive repetition, suggest the unwavering, unemotional, mechanical nature of the Terminator cyborg. One can see from Example 3.9's transcription that this rhythmic tattoo is syncopated, and hangs slightly over the bar. The next repetition of the rhythm occurs immediately after the sixteenth rest of the second measure. Having the rhythmic cell not line up neatly with the bar propels the music forward, so it just keeps coming, relentless, nothing stopping it. And the rhythm never really stops; at the end of the title credits, the music is just faded out, as is the "The Terminator" title shot. And the cyborg, though it

30 The timbre used in this rhythm sounds to my ears to be synthesized, but may be a more natural sound altered electronically.

31 There are occasional electronic interjections on another track, but these do not disqualify this rhythmic repetition as "minimalist."

seems to be dead, never really stops coming; "he'll be back" for the sequel.[32]

But this minimalist rhythmic repetition is not the only element of the title theme, simply the one that dominates its length (it is continuous throughout the theme, and the only element between 1:46-2:16 and 2:54-3:24). The middle of the title theme (2:17-53) has a synthesized melody—the first part of which is shown in Example 3.10—layered on top of the rhythmic cell; this melody later becomes the film's love theme for the human characters. Such a melody, laden with emotion, would seem to negate a minimalist interpretation of the repeating rhythmic cell. But this love theme seems to be on a different plane altogether from the minimalist rhythmic cell; because of the rhythm's syncopation and hanging over the bar, the two musical elements rarely synchronize rhythmically. Thus though they occur at the same time, they are disconnected. When the melodic, "human" theme is over, the rhythmic cell becomes even stronger, with an anvil-sounding percussion hit on every new iteration. Thus the minimalist repetition "wins out," at least in the title theme, over the more human melody.[33]

Example 3.10: Melody of *The Terminator*'s title theme

32 Karen Collins applies this notion of inexorability not to the title music but to the repetitive nature of the cyborg's leitmotif, shown in Example 3.11. Karen Collins, "I'll be back: Recurrent Sonic Motifs in James Cameron's Terminator Films," in *Off the Planet: Music, Sound and Science Fiction Cinema*, 171.

33 And though it seems like the mother, Sarah Connor, has won at the end of the film, the cyborg she has just "killed" becomes—the paradoxes of time travel—the prototype for its future self.

But it is not simply the minimalist techniques of *The Terminator*'s title theme that iconically suggest the mechanical nature of the cyborg. The cyborg itself has a minimalist leitmotif, shown in Example 3.11, that cyclically repeats. It is used frequently throughout the film to mark appearances of the robot.

Example 3.11: The Cyborg's Leitmotif in *The Terminator*

This leitmotif's timbre, recalling that of the title's rhythmic cell, is hollow and metallic sounding. In rhythm and tempo, it has similarities to a quickened heartbeat, as noted by Karen Collins.[34] Indeed it has that affect on the viewer; but its timbre, rhythmic precision, as well as the (quite inorganic) gap of rests after every four notes, mark it—if a heartbeat—as an inhuman, robotic one. An example of this leitmotif repeating in a minimalist manner occurs near the beginning of the film, when the cyborg has just jumped back in time and appears next to a dump truck (4:22-5:09). The repetitive music works well with the emotionless actions of the cyborg; the leitmotif seems to portray the working of its programming as the machine dispassionately observes its surroundings. The strong connection of mechanical music and emotionless cyborg is reinforced with the near-mickeymousing of its walk; several of the cyborg's strides are in time with the leitmotif's rhythm (see for example 4:47 forward).

34 Collins, "I'll be back," *ibid.*

3.5 *A.I.: Artificial Intelligence*

Again recalling Fink's observation, minimalism is "constantly imagined as the music of machines, androids, and cyborgs."[35] While an analysis of *Koyannisqatsi* revealed how minimalist techniques might show the alterity of machines, and an examination of *The Terminator* described how it may be employed for cyborgs, there is one term left. In 2002's *A.I: Artificial Intelligence*, John Williams uses minimalist techniques as an iconic sign for the remaining term, android.[36] *A.I.: Artificial Intelligence*—a science-fiction twist on Pinocchio—centers on a boy android, David, who looks just like a human and has been programmed to be capable of love and emotion. He is given to a mother—whose own son has been cryogenically frozen until they can find a cure for his illness—to test the product. If the mother decides to keep the robot and have it love her, she must read a special series of words to the robot to have it imprint to her. In the sequence "Hide and Seek" (15:33-18:28), the mother is conflicted—she has not yet followed the imprinting protocol because she still sees David as a machine, as an Other. As the scene continues, the mother begins to see David more and more as a potential subjective being, culminating in her taking offense when he finds her in the bathroom.

The music by John Williams is integral to expressing this change in the mother's psyche. At the beginning (15:33-16:33), when she still sees David as a machine and tries to ignore him, the music uses minimalist techniques. There is no dynamic change, there is a steady pulse, and the music is played with near-mechanical precision. The music is

35 Fink, *Repeating Ourselves*, 45.
36 An android is a machine that looks human.

not melodic, but made up of short repeating motives (shown in Example 3.12).[37] Example 3.13 shows the order in which these occur, as well as their repetitions and instrumentation. The primary instrument is shown at the top of each entry, and supporting parts are listed underneath (i.e., pizzicato strings are more "accompanimental," while the piano and synth are the main instruments heard).

Example 3.12: *A.I.*'s motives A, B, C, D, and D'

Example 3.13: *A.I.* "Hide and Seek" music from 15:33-16:33[38]

Motive	A (4 times)	B (4X)	C (about 3X)	D	C (about 3X)	D' (I)
Instrumentation	piano pizz strings	bell synth string pad	piano	piano sparse pizz on low strings	piano	piano sparse pizz on low strings

37 Musical examples shown are the elements of the score that are foregrounded. At the beginning of the scene, there is very little, and sporadic, "accompaniment," mixed very low, supporting an interpretation of minimalism.

38 After the motive letter in this example and in Example 3.15, there are either Arabic or Roman numerals in parentheses. The Arabic numerals, followed after the first instance with an "X," mark the number of times the motive is repeated, i.e. (4X) means a motive is repeated four times in a row. The Roman numerals—only used for motives D and E—mark whether it is the first (I), second (II), etc. time this motive is played, i.e. D(V) is the fifth instance of motive D.

Motive	B (4X)	D (II)	D" (III)	B (2X)
Instrumentation	bell synth string pad harp gliss clarinet trill	piano	piano string pad	bell synth string pad harp gliss clarinet trill

As one can see from these examples, the music begins with four repetitions of motives A and B, which are closely related in pitch and rhythmic content. The motives are unsettled from a tonal perspective; the pitch collection of A and B establishes no particular key. This slightly unsettled sense can be interpreted as reflecting either the mother's conflicted mind or the Otherness of the robot. The instruments used for these motives and their manner of playing support the reading of the music (and the robot David) as mechanical. The motives are performed with precision, with no emotional shading. Certainly the reading of a synthesizer as something mechanical, as Other, is common practice; electronic/synthesizer music has signified alterity in film as early as the late 1940s.[39] And, as noted above, the synthesizer is a technological device, with its sound production method dependent upon electronics. But the piano also supports a mechanical interpretation; with its lever and hammer arrangement it is one of the most mechanical of instruments, and does not have the directly kinesthetic association with the human body that, for instance, wind instruments do, with their manner of sound production dependent on human breath. A piano may have a more organic than mechanical connotation if its performance has what are considered human elements—emotional sensitivity with dynamics, rhythmic fluidity. But the use of the piano on

39 Hayward, "Sci Fidelity—Music, Sound, and Genre History," 9.

motives A and B, because of its rhythmic precision and lack of dynamics, lends itself more to a mechanical than to a "human" interpretation.

After the minimalist-sounding A, B, and C motives, a more conventionally melodic motive, D, is played. This motive is still repeated and performed in a mechanical manner, but now a key, C Major, is established through both the motive and a C pedal point. The simplicity of the motive and key, as well as the lightness of instrumentation—there is very little accompaniment here—evoke a childlike character, portraying the wonder of the robot boy as he watches the mother perform routine household tasks like reading the paper and making the bed. The D motive is varied slightly, marking the beginning of the change in both the music and the mother's psyche.

As the scene develops, and the mother begins to see the robot David more and more as a real boy, potentially having subjective experience, the music becomes less minimalist and more characteristic of the Romantic classical Hollywood film score. The steady pulse remains, but motive D is varied nearly every time it appears—certainly not a characteristic typical of minimalism. Then, at 16:33, the music is pushed further from the minimalist technique with the appearance of a full-blown melody (Example 3.14, labeled as motive "E").

Example 3.14: Melody "E" of "Hide and Seek," *A.I.*

The melody "E" shown in Example 3.14 is first performed by a woodwind blend that prominently features the flute in its low register—a very breathy, human sound. As an "echo" in the melody's second and fourth measures, the bell synth plays its "B" motive. The use of the synthesizer here suggests that the idea that David is a machine still haunts the mother's thought processes, but this is beginning to be overcome by more subjective, emotional elements—the flute melody. Example 3.15 shows the motives and instrumentation of the rest of "Hide and Seek" from 16:33 to the end of the scene. Beginning with the first incidence of melody E, the music becomes more and more complex. Thicker instrumental accompaniment layers are added with every new iteration of E or D, and dynamics become increasingly prominent. What was only mechanical piano and synth (with the occasional pizzicato from the strings) changes to a richer, more expressive instrumentation and performance.

Example 3.15: "Hide and Seek" music from 16:33-18:28, *A.I.*[40]

Motive	E	A (4X) //	B' (4X)	E (II) //	A (2X)
Instrumentation	low flute/wwd low pizz strings harp arpeggio	harp low pizz str/bssn	bell synth swirling strings thicker accompaniment	higher flute/wwd/bell swirl strings low pizz str.	harp piano
Echo Echo Instrumentation	B Bell synth			E F. Horn	

40 Key to Abbreviations and Special Marks: wwd: woodwinds, pizz: pizzicato, str: strings, clnt: clarinet, F. Horn: french horn, accomp.: accompaniment, //: there is a short break between sections, ...: there is a short section different motivically from the rest

Motive	C ...	B (2X)	D (V)	D" (VI)	B' (2X)	E (III) ...
Instrumentation	flute harp	bell synth swirling clnt	flute/wwd swirl strings thicker accomp.	flute/wwd swirl strings thicker accomp.	bell synth harp swirl strings	flute/wwd swirl strings pizz low strings
Echo Echo Instrumentation						E F. Horn

The second time E appears (EII), the echo in its second and fourth measures is no longer the bell synth, but the French horn; the motive it uses to echo is now derived from the "human" melody E, not the mechanical motive B. There is still a bell sound, but now it is not a synthetic bell but a "real" one, and it doubles the flute melody line. These musical changes—the switch from synthetic to real bells, the change of echo motive—during this second iteration of E suggest further internal psychological change in the mother. She is outwardly frustrated with David: during EII she puts him in the coat closet to get him out of the way. Her conflicted feelings toward him are visually obvious—she pushes the laundry cart into the door, and then just sits on the floor, thinking. By the fifth occurrence of D, D(V), she has had a fit of conscience, and decides to treat him more like a human than a machine. She tells him that had she put him in the closet as a game, as "Hide and Seek."

The music suggests that this change in action is accompanied by internal change: for the first time, motive D (now in its fifth iteration) is heard not with piano, but the flute and thick accompaniment instrumentation last heard on the E melody. So a motive once associated strictly with the machine is played by more organic instrumentation, i.e., it is

performed by instruments that have a more palpably indexical relation to embodied action. There is a brief reminder of the mechanical when motive B is played once again with bell synth—the mother must still harbor reservations—but E (III) suggests that she has been won over. The melody E is played yet again with flute, but there is no reminder of the bell sound, not even of "real" bells. The echo motive is again French horn (an instrument dependent on the human body) and derived from the E melody. The lyrical melody, the human instruments, the dynamics, the non-mechanical style of playing—all these suggest a change in the mother's psyche from the beginning of the scene. What she once saw a machine to be pointedly ignored, she now sees as something potentially capable of filling the emotional void in her life. She now sees David as a possible subjective being, not as Other; she must, because two scenes later, she follows the imprinting protocol to have David love her.

So in *A.I.*, what was mechanical, motivic music employing minimalist techniques changes over the course of a scene to become more typical of the conventional Hollywood film score. This musical change reflects the internal emotional change of one of the characters, who begins with the perception of the android boy David as simply a machine and ends with her seeing him as a possible subjective being, and soon deciding to imprint him. Thus—at least for the composer John Williams—dynamic change and melody is associated with subjectivity; minimalist techniques are associated with the Other of the machine.

CHAPTER FOUR
MINIMALISM AND THE ALIEN

4.1 Introduction

The lack of subjectivity—at least the lack of an understandable, emotional *human* subjectivity—is not limited to its association with machines or robots. Minimalism can also signify the Otherness of aliens. Aliens have traditionally been marked in film scores with music that is different from the conventional classical Hollywood scoring. As Timothy Scheurer notes,

> Aliens are physical embodiments of the Other, the thing separate from our earthbound humanity ... The hallmark of the music associated with the alien is dissonance, atonality, and discordance. Polychords, chromaticism, tritones, and other avant-garde harmonic and melodic devices (electronic music especially) as well as irregular metres and polyrhythms characterize the music of the alien. Recent science fiction films that feature more benign aliens downplay the discordance, but one will probably find that melodies and harmonies associated with the alien still fall outside the melodic and harmonic vocabulary of the postromantic tradition that characterizes so much of film scoring.[1]

This association of aliens with dissonant music is so prevalent to have become culturally encoded.[2] The dissonant music, to use Gorbman's borrowing from Barthes, serves as an

---

1 Timothy E. Scheurer, "The Score for *2001: A Space Odyssey*," *Journal of Popular Film and Television* 25, no. 4 (Winter 1998): 172-183.

2 I will be using the *Grove Music Online* definition of dissonance: "a discordant sounding together of two or more notes perceived as having 'roughness' or 'tonal tension'." Dissonance is not absolute at the psychoacoustic level but at least partly determined by both the musical system/idiom in which it takes place and the familiarity of an audience with that system. I am assuming an audience familiar with the Western tonal system. To such an audience, atonal musics, eschewing conventional consonances like thirds and fifths, are very dissonant. Minimalist music, while not conventionally tonal per se, predominantly uses non-"rough" intervals. "Dissonance," Grove Music Online, ed. L. Macy, http://www.grovemusic.com.ezproxy.lib.utexas.edu (accessed 24 Jan 2008); Claude V. Palisca and

ancrage, anchoring the image of the alien to a meaning of fright, terror, or otherworldliness, even if the alien's intentions are eventually shown to be good or neutral, or remain unknown.[3] For example, the alien monoliths in *2001: A Space Odyssey*, are marked with the unsettling music of Gyorgy Ligeti.[4] Though later revealed as non-malevolent (perhaps sublime), the atonal music with which they are originally associated forces the viewer to interpret them initially with fear. The same can be said for John Williams's music for *E.T.* and *Close Encounters of the Third Kind*; the opening music for both of these films is dissonant and uses avant-garde instrumentation, initially anchoring them to fright, though the aliens in both cases are shown to be completely benevolent.

As the following analysis will indicate, minimalism, on the other hand, does not compel the listener into a particular reading of fright or trepidation. Rarely dissonant, it does not have the menacing cultural coding of the atonal music so frequently linked with aliens, though like atonality it does have the capacity to connote "Other." It marks an alterity not frightening but otherworldly, enigmatic, beyond your understanding. When used with alien images, minimalism does not render the on-screen emotional content explicit; more emotionally neutral than atonality, it does not dictate a particular response. While Gorbman might say that this would be a risk, "confronting the audience with an image they might fail to interpret," for filmmakers who wish to leave meaning

---

Brian C. J. Moore, "Consonance," Grove Music Online, ed. L. Macy, http://www.grovemusic.com.ezproxy.lib.utexas.edu (accessed 24 Jan 2008).

3 Gorbman, *Unheard Melodies*, 32.

4 Scheurer, "The Score for *2001: A Space Odyssey*."

indeterminate, minimalism is a boon.[5] Without the strong cultural coding of dissonant music, minimalist music leaves the emotional interpretation of alien images it accompanies up to the audience. The viewer/hearer may make his own interpretation based on the alien's actions in the diegesis and his own thoughts. This open-ended meaning of minimalist music is particularly appropriate for the 2002 film *Solaris*, where ambiguity leaves the whole film open to interpretation.[6]

4.2 *Solaris*

In the science fiction film *Solaris*, scored by Cliff Martinez, minimalist music is used as a leitmotif for an entire alien planet, marking it and its influence. In the Stephen Soderbergh-directed film, a group of humans on a space station orbiting the planet Solaris have been studying the celestial body.[7] Odd events begin to occur, so the psychiatrist Chris Kelvin (George Clooney) is sent to investigate. He finds that doppelgangers and dead relatives of the crew have appeared—"alive"—on the station. When these visitors die, they are resurrected. Now Kelvin's wife, Rheya, who had committed suicide on Earth, also appears on the space station. Somehow the planet Solaris is causing this, but the crew cannot communicate with the planet. Its purpose remains a mystery. Though the planet obviously has some consciousness, its subjectivity and purposes are alien, beyond human ken. The planet remains an unknown, an enigma. The music by Martinez

5 Gorbman, *Unheard Melodies*, 18.
6 *Solaris*, DVD, Directed by Steven Soderbergh (2002; Los Angeles, CA: 20th Century Fox, 2003).
7 This is a remake; the first *Solyaris* film was produced in the Soviet Union and directed by Andrei Tarkovsky (1972).

reinforces both the Otherness of the planet, and, closely related to this, the planet and the film's ambiguity.

The film begins with no music—not even title music—only ambient sounds and dialogue. This is remarkable, as the opening of a movie is one of the most common places for music to occur, setting mood, genre, and expectations for what is to follow.[8] So even silence is used here for ambiguity; the viewer is not musically prodded to know if the film is a mystery, romance, or heroic adventure. In this music-less opening, Chris Kelvin is shown a recording of his friend, Dr. Gibrarian, asking him to come to the planet to investigate something mysterious; Gibrarian will not tell him what. After this recording, an image of the planet Solaris appears on the screen, accompanied by the first music of the film (6:51-9:28). Example 4.1 (next page) shows an approximate transcription of the first minute of this music.[9] This music fits the definition of minimalist techniques introduced in Chapter One: it has a repeated pattern (E-B) with a steady pulse, lacks real melody, is primarily diatonic, has long stretches of static harmony (no new pitch in the horn drone from 7:02 until 7:30), and because of these static sections and repetition it has a hypnotic sense.[10]

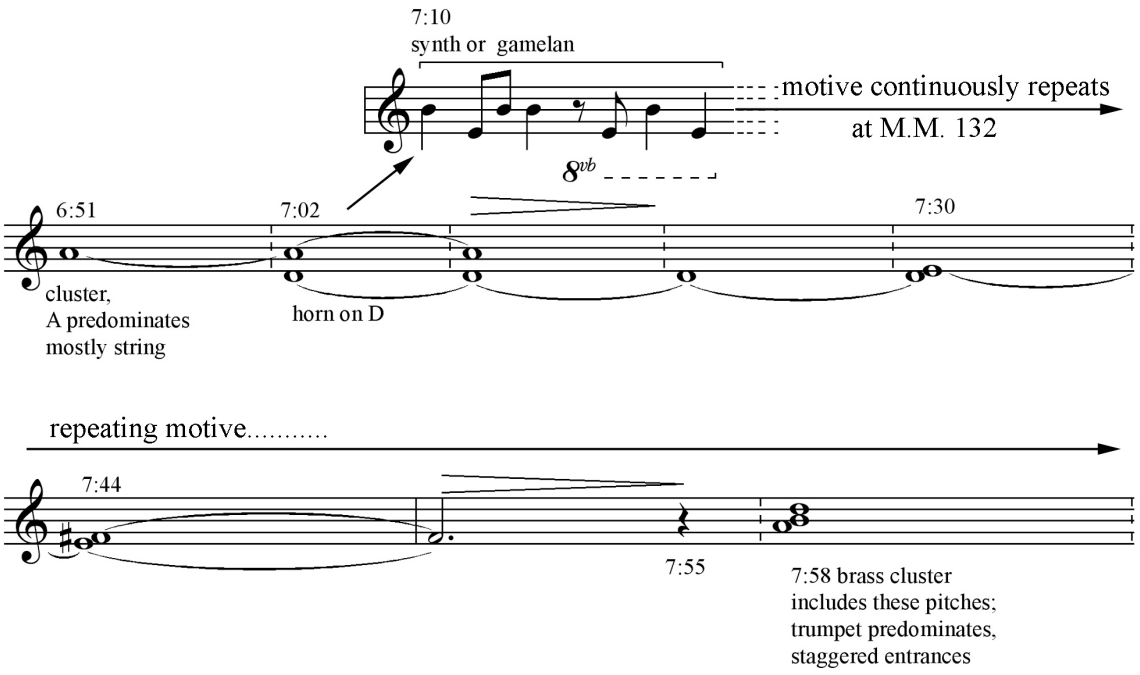
---

8 Gorbman, *Unheard Melodies*, 82.

9 Likely composed with synthesizer and samples, this piece defied a bar-for-bar transcription.

10 Several critics have also called the score minimalist; Mick LaSalle called the film "trance-like and trance-inducing, and this quality is only emphasized by Cliff Martinez's minimalist Philip Glass-like score." Jason Comerford of *Film Score Monthly* said, "minimalistic scores like Cliff Martinez's *Solaris* (one of the year's best) and Glass' score for *The Hours* have gone a long way in developing the style into a distinctively filmic one." Mick LaSalle, "Soderbergh's 'Solaris' is all surface and cold as Kubrick," *San Francisco Chronicle,* 27 Nov 2002, http://sfgate.com/cgi-bin/article.cgi?f=/c/a/2002/11/27/DD24536.DTL (accessed 1 July 2007); Jason Comerford, "The Best (& the Worst) of 2002."

Example 4.1: First Music in *Solaris* (6:51)[11]



It does feature intervals of a major second, but without sounding atonal (in context, these intervals do not sound "rough"); however, neither does it sound particularly tonal in the traditional sense because of its prominent open fifths and tone clusters—perhaps a better description would be to call it pandiatonic. These tone clusters are frequently minor-inflected (7:58), but sometimes major (7:44, the F# after the long D drone gives the effect of a D major chord), so it does not lean definitively toward the culturally-encoded models of the major/minor modes as either "happy" or "sad." The repeating E-B eighth note pattern is at a fairly fast tempo, while other parts move quite slow; thus, the traditional affective quality of tempo becomes difficult to determine. The same could be said of the

11 This example has been condensed; dashed bar lines are used to separate musical events, not as "real" bar lines. Musical elements occur at the times indicated.

instrumentation, which features strings, brass, and tonal percussion (including either steel drum, gamelan, or perhaps some synthesized sound). The inclusion of these percussion instruments gives the music a bit of exotic flavor, but one that points to no specific culture. So the music lacks the dissonance to portray the alien planet as terrifying, lacks the major-mode uplift to mark the heroic, does not have the sad minor melody to mark the tragic, or the lyricism to mark romance. Instead, it inhabits an enigmatic realm, one whose only hints are its hypnotic state and exotic instrumentation. Lacking easily decipherable culturally-encoded meaning, the music is ambiguous. Since Gibrarian would not tell Kelvin what was going on at the Solaris space station, we do not know whether to expect something good or bad to ensue. This music, which accompanies our first view of the planet, with its sense of exotic Otherness but no other coded meaning, also gives no hint. Just as Kelvin does not know what is in store, neither do we; the composer has not told us what to feel or expect. The score reinforces the mystery.

The music shown in Example 4.1 recurs with variations at other enigmatic points of the film where either the planet or its influence are shown, the score's mysterious nature reinforcing theirs.[12] A faster version occurs in the sequence at 20:46-23:28, when Kelvin readies for bed; we see a view of Solaris, and then we see images of his life with Rheya on Earth. Are these simply flashbacks or are they dreams, and, if the latter, is

12 There is also non-diegetic music in the film, which, laking steady beat and rhythmic repetition, is better described as atmospheric, not minimalist. Prominently featuring clusters, it strongly recalls Ligeti, especially at 1:11:00-1:17:53. This music shares a similar instrumentation to the more minimalist cues, but is often over scenes with a clearer emotional import—when Kelvin sends Rheya away in a pod, when Rheya is resurrected, when Kelvin is feverishly ill, and when the space station is crashing into the planet. With a clearer emotional meaning, these scenes do not need the ambiguity of the minimalist music and instead have the traditional atonal scary signification. While different, the atmospheric music also signifies Otherness by means of its atonality.

Solaris causing them? From 25:27-28:50, we see Rheya's seduction of Kelvin, both in flashes depicting Earth and others on the space station. This seduction is accompanied by another variant of Martinez's minimalist music, which features a repeating throbbing electric bass that gives the hypnotic music an erotic tinge. Is Kelvin asleep or awake? Even he doesn't seem to know. On "awakening," he sees "Rheya" beside him on the space station and tries to wake himself up, thinking it is still a dream. Is Rheya really there, or a figment of his imagination; is she human or an alien Solaris manifestation? Is she there for good or ill? The score, still enigmatic, gives no clue. Music almost identical to that of 6:51 occurs again from 59:04-1:02:42, where a view of Solaris precedes Kelvin waking(?)/dreaming(?) to see his friend, Dr. Gibrarian (a Solaris projection? a dream?), in the shadows of his room. Kelvin peppers Gibrarian with questions in an attempt to understand what is occurring:

Kelvin: What does Solaris want from us?

Gibrarian: Why do you think it has to want something? This is why you have to leave. If you keep thinking there's a solution, you'll die here.

Kelvin: I can't leave her. I'll figure it out.

Gibrarian: Do you understand what I'm trying to tell you? There are no answers, only choices.

Just as the music seems to give us no answers, by stubbornly not using obvious cultural codes, neither does the dialogue. Instead it indicates that there *is* no answer to these questions.

The ending of the film is just as cryptic. Because of a power failure, the space

station begins to fall into the planet. The humans plan to escape back to Earth on the ship Athena. More minimalist-style music accompanies the readying of Athena, a view of Solaris, and images of Kelvin's life afterwards back on Earth (1:22:08-1:25:08). But the next scene calls into question whether Kelvin ever went back to Earth: we see him back on the space station, deciding to stay. The station—Kelvin inside—falls into Solaris, but then we see a view of Kelvin in his kitchen on Earth, and suddenly Rheya is there with him. Kelvin asks whether he is dead, and Rheya replies, "We don't have to think like that anymore." They kiss, and the film ends with a fade out to an image of the planet Solaris (then fading to the end credits) accompanied by the same minimalist music that marked its first appearance on the screen (1:31:07-1:33:44). Did Kelvin go back to Earth or stay on the space station? Is this also a dream, did he somehow join or merge with Solaris, or did he die and is he now in an afterlife with Rheya? The film leaves its interpretation up to the viewer, as does the score. By its lack of explicit culturally encoded emotional meaning, it does not force the listener into a particular reading. Instead, the music reinforces the ambiguity of the enigmatic scenes of the film.

Though it lacks explicit emotional culturally-encoded connotations, the music does serve in *Solaris* as a sign for Other. This is particularly appropriate, since what is an Other but something different, something outside our experience that we cannot truly understand?[13] The alterity expressed by the music in *Solaris* is not simply an artifact of its divergence from conventional scoring; the non-diegetic score's Otherness is reinforced by how the music is used in conjunction with filmic elements.

13 Both the planet and the entire film seem to fit this description.

The placement of music in *Solaris* is similar to that of *King Kong* (1933), though *Solaris* lacks *Kong*'s title music. *King Kong* begins in New York, the "real" world of technology and rationality, and this world is marked by a lack of non-diegetic music. When the boat nears Skull Island, and the protagonists are about to be thrown into the enchanted, irrational, Other world of giant beasts, music infiltrates the soundtrack.[14] The score of *Solaris* works in an analogous way. There is no title music, only dialogue and diegetic sounds for the first 6:51 of the film, which occurs on Earth. The diegetic sounds—like rain, chopping vegetables, and, later, space station noises—are quite loud and noticeable in the audio mix, marking the mundane as opposed to the music's alterity. The first non-diegetic music occurs with the initial view of the planet Solaris on the screen, and the music continues for Chris Kelvin's journey to its space station. Not only is the alien planet tied from near the beginning of the film with minimalist music, it is marked as Other from life on Earth by the very fact that its first glimpse is accompanied by music.

Music continues to be used throughout the film as a leitmotif for the planet, accompanying both images of it on the screen and images of its influence on the crew. As mentioned earlier, it accompanies Kelvin's sleep/wake state where—perhaps—Solaris manifests his dead wife, Rheya (20:46-23:28, 25:27-28:50). Its minimalist, hypnotic qualities are particularly appropriate as it is so often used over dream-states like these. The music becomes more and more prevalent on the soundtrack as the protagonist, Chris Kelvin, becomes more enmeshed—perhaps hypnotized—with the planet and what he

14 Gorbman, *Unheard Melodies*, 79.

thinks is its manifestation of his dead wife. According to Flinn, classical Hollywood film scores from the Golden Age were, on average, forty minutes long.[15] The non-diegetic score for *Solaris* is approximately 45 minutes, a similar length to this standard, but its placement is unusual and reflects Kelvin's entanglement with the planet.[16] The first 32:16 of the film, when Kelvin is on Earth and newly at Solaris, contains 8:41 of diegetic music. From 32:16 to 1:02:42, there is 11:55 of music. The last third of the film, 1:02-43-1:38:06 (only about 36 minutes) has 24:08 of the score, more than half its total length. Though the film's ending is ambiguous, if any particular interpretation is implied, it is perhaps brought about by this increase in nondiegetic music. The increasing prominence—to near-continuity—of music so closely linked with Solaris hints that Kelvin has resolved his issues with the planet and dead wife by, in some sense, physically joining with the planet as the station crashes into it. Thus the salvation of the main character arises through his union with the Other, marked with the triumph of the minimalist music over the mundane world's diegetic sound.

15 Flinn, *Strains of Utopia*, 18.

16 I am including both minimalist and more ambient cues in this calculation, as they both signify alterity.

CHAPTER FIVE
MINIMALISM AND CULTURAL ALTERITY

5.1 Introduction

The foregoing analyses have shown that minimalism may signify a variety of Others. In films such as *Koyaanisqatsi*, it may iconically represent the machine through its exact repetition and steady pulse. In movies like *Solaris*, by not partaking of the traditionally dissonant cues for the alien, it may further filmic ambiguity, leaving emotional interpretation to the audience. But no discussion on minimalism's portrayal of alterity could be complete without describing how it might grapple with a more fundamental, non-Western Other. Such an analysis, like that for the alien planet Solaris, should be predicated with a description of how this might be accomplished in a classical Hollywood score. After explicating the conventional methods for indicating different cultures, one may compare the classical Hollywood model with minimalist scores, seeing how they may agree with or diverge from that model.

5.2 Scoring Culture

It has long been pointed out by film music scholars that one of the functions of the score is to evoke a sense of time and place, and to indicate culture. Aaron Copland acknowledged this purpose in a 1949 article on film music in the *New York Times*, and Claudia Gorbman has included it under “narrative cueing” as one of her principles of

Classical Hollywood film music.[1] Through the use of "strongly codified Hollywood harmonies, melodic patterns, rhythms, and habits of orchestration," composers may hint at the era and geographical location of the film's story and give stock characterization.[2] Of particular interest within this function is film music's depiction of non-Western cultures. What are the codes for indicating ethno-cultural information in classical Hollywood film music? What is their origin, how might they have changed over time, and why were they used?

Roy Prendergast, in *Film Music: A Neglected Art*, gives two principles with which to conjure location and culture in the score. First, one may use culturally indigenous music; second, one may use devices that "are popularly associated with foreign lands or people."[3] In his article "Hearing Place: Film Music, Geography, and Ethnicity," Mark Brownrigg details a longer list of conventions for marking era, locale, and culture: composers may employ ethnic instruments or use Western ones in imitation of them; they may include rhythms or melodies that evoke a certain place; composers may design melodies that closely resemble those associated with a location; or they may actually use ethnic music or "produce a simulacrum of it."[4] But what must be acknowledged is that these nods to temporality, culture, and location customarily take place within scores dominated by a late-Romantic style. In classical Hollywood films, these narrative cues

1 Aaron Copland, "Tip to Moviegoers: Take off Those Ear-Muffs," *New York Times*, 6 Nov 1949, section 6; Gorbman, *Unheard Melodies*, 83.
2 Gorbman, *Unheard Melodies*, 83.
3 Roy M. Prendergast, *Film Music: A Neglected Art,* 2nd ed. (New York: W.W. Norton and Company, 1992), 214.
4 Mark Brownrigg, "Hearing Place: Film Music, Geography, and Ethnicity," *International Journal of Media and Cultural Politics* 3, no. 3 (2007): 312.

are often pure cliché, like the pentatonic "Eastern" motive or 4/4 "Native American" drumbeats shown in Example 3.1 and 3.2. They might reference a specific culture to a Western audience familiar with their enculturated codes, but are rarely authentic. As celebrated film composer Dimitri Tiomkin asserts, "Much of the music that is accepted as typical of certain races, nationalities and locales, is wholly arbitrary. Audiences have been conditioned to associate certain musical styles with certain backgrounds and peoples, regardless of whether the music is authentic."[5] According to David Butler, even when a composer uses ancient or ethnic instruments, or does historical research into a specific genre—like Miklós Rózsa—the resultant scores tend to "*allude* to historicity rather than [be] a slavish recreation of a particular period's style."[6]

Two particular film music clichés have caught scholarly attention: those depicting the Oriental and the Native American. Both of these stereotypes began with portraying their respective signifieds as undifferentiated—the Oriental cliché is applied in classical Hollywood film to represent a range of Asian cultures (Chinese, Japanese, etc.), the Indian cliché to represent Sioux, Apache, Cherokee, etc. They are not individuated because they serve as social constructs, as Others to the West.

The Oriental cliché, according to Bazelon, is a pentatonic idiom with open fifth harmonies.[7] He claims that within a Romantic symphonic style, one "had only to add the

---

5 Dimitri Tiomkin, "Composing for Films" (1951), reprinted in James L. Limbacher, ed., *Film Music: From Violins to Video* (Metuchen: Scarecrow Press, 1974), 60.

6 David Butler, "The Days Do Not End: Film Music, Time, and Bernard Herrman," *Film Studies* 9 (Winter 2006): 53.

7 A familiar example of this Oriental stereotype is found in the 1955 Disney cartoon *Lady and the Tramp*, which features "The Siamese Cat Song." An example of the musical conflation of all Eastern cultures, this song uses the same musical stereotype for the Siamese that is also used to represent China or Japan;

omnipotent gong to achieve the proper "oriental effect."[8] Prendergast agrees that Orientalism is portrayed with pentatonicism, and adds that these clichés are not "real": "The 'Chinese' music written for a studio film of the 1930s and '40s is not, of course, authentic Chinese music but rather represents our popular Occidental notions of what Chinese music is like."[9] In his article "Anti-Japanese Musical Propaganda," W. Anthony Sheppard lists Orientalist musical conventions used specifically for the Japanese in World War II US propaganda films; again, tunes are pentatonic, they are often performed by brass or low register reeds and strings, and are usually *forte* and performed aggressively. Melodies are commonly harmonized with parallel perfect intervals, the meter is 4/4 with simple march rhythms, and each phrase is initiated with a gong on beat one.[10] In such propaganda films, Japanese are the malevolent Others, whereas in the context of World War II, China was an ally. Thus instead of conflating friend and foe with identical Orientalisms, wartime ideology required that they be musically differentiated. Thus Sheppard notes that the Chinese—as opposed to the more brash, martial style given to the Japanese—are given a lighter, more delicate pentatonic Oriental music.[11] Though their music is different, they still employ the same Oriental stereotype; it is only the performance style (warlike vs. delicate) that is altered.

---

there is a nearly pentatonic melody, harmonized in parallel fourths, and an accompaniment in perfect fifths.

8 Irwin Bazelon, *Knowing the Score: Notes on Film Music* (New York: Van Nostrand Reinhold Company, 1975), 109.

9 Roy M. Prendergast, *Film Music: A Neglected Art,* 2nd ed. (New York: W.W. Norton and Company, 1992), 214.

10 W. Anthony Sheppard, "Anti-Japanese Musical Propaganda," *Journal of the American Musicological Society* 54, no. 2 (2001), 321-2.

11 *Ibid.*, 330.

In addition to the Oriental musical stereotype, the classical Hollywood film also represented the Native American with a set of musical conventions; Claudia Gorbman lists these in her essay, "Scoring the Indian: Music in the Liberal Western." First, there is the "warpath cliché;" it usually features a first beat accented 4/4 drum rhythm performed on tom-tom (shown in Example 3.2), though this may also be performed as a low pitch or as perfect fifths. There may be a solo melody above this or it may be harmonized in parallel fourths. Second, there is the rarer stereotype of the Indian as "noble savage," this leaves out the tom-tom rhythm for the calmer, sweeter sound of legato string or flute modal melodies with "pastoral" accompaniment.[12]

The widespread use of these Indian and Oriental clichés begs the question of their origins. Gorbman claims that the Native American stereotype descends "from a Euro-American all-purpose shorthand for representing primitive or exotic peoples." Peasants, Turkish, Chinese, and even Scotsmen, she asserts, have been represented with open perfect intervals, pentatonic scales, and repeating rhythms since the late 1700s. The specifically Indian conventions, she argues (borrowing from Michael Pisani), emerged in popular music of the 1800s, and were "probably inflected by actual exposure to American Indian song (through ethnographic recordings and Wild West shows) to sound a bit more Indian and a bit less all-purpose exotic."[13] Orientalist musical stereotypes seem to follow from the same source, from the 18th century's exoticist shorthand; this was then

12 Claudia Gorbman, "Scoring the Indian," 235.
13 Gorbman, "Scoring the Indian," 235-6.

developed by composers such as Puccini in *Madame Butterfly*.[14]

Though these clichés were common through the classical period of the Hollywood film score, have they changed as our conceptions of these cultures have changed? Gorbman addresses this issue, saying that the codes for "Indian music" continued through the 1950s and '60s, and have "continued to prevail in all the audiovisual media."[15] But she holds that as the conception of the Indian has changed over the century, some more recent Western films have reflected this ideological shift. In 1930s and 1940s Westerns, the Indian was a threatening enemy that had to be fought so that the white American hero could fulfill manifest destiny.[16] In the 1950s and '60s, a more liberal Western emerged, one where the Indian was still Other but now was portrayed in a more positive light, as an emblem of the wise and oppressed.[17] Though cinematic representation shifted in some films—the evil Indian cliché and its music continued—it took longer for the music to change.[18] Rosenman's score for *A Man Called Horse* (1970) shows one way the Indian musical representation shifted; he used authentic diegetic Indian chants, and then segued into his own modernist Western film score idiom, retaining some instruments and features of the diegetic music. Thus, his score is not the egregious musical stereotyping of earlier films, but "represents the Sioux chants through a western filter, making it readable for viewers."[19] *Dances with Wolves* (1990) presents a more stunning example of the change in the Western view of the Native American. There are diegetic Indian chants

14 Sheppard, "Anti-Japanese Musical Propaganda," 327.
15 Gorbman, "Scoring the Indian," 243-4.
16 Gorbman, "Scoring the Indian," 234.
17 *Ibid.*, 239.
18 *Ibid.*, 241.
19 *Ibid.*, 246

and songs, still marking the culture as alien. However, John Barry uses his Romantic, lush score not only for the white protagonist, but for the Sioux as well; underscoring them with Romantic music foregrounds the film's portrayal of the Indians as "us," as representing "traditional American community and values."[20]

Gorbman argues that—at least for the Indian—musical clichés have continued despite a cultural shift in the view of the Native American; the ideological change is reflected in only some scores.[21] Why has the musical cliché remained? In *Unheard Melodies*, Gorbman asserts that music's purpose in classical Hollywood film "is quick and efficient signification to a mass audience."[22] Musical stereotypes, well known to an audience enculturated with their signification, *work*, and do so immediately. Film composer Dimitri Tiomkin claimed that though these musical signs seem arbitrary, they function as a "telegraphic code that audiences recognize."[23] They may not be authentic, but their meaning is clear to the viewer/listener; "Were the Indian music to stray from the well-established conventions, it would not be doing its job. Both narratively and musically, the Indians are reduced to ciphers, bits of local color, narrative functions."[24] What Gorbman brings out with this statement is another reason for musical clichés: they represent characters who are also presented as stereotypes. The ethnic Other in classical Hollywood film is rarely a complex individual, but functions as a symbol, a foil for the

---

20 *Ibid*., 248. It seems ironic that the way Barry came up with for the audience to identify with the Other was to impose Western music upon it; in an attempt to subvert the musical stereotype, he has erased its difference and replaced it with Western music—a new kind of musical imperialism.
21 Gorbman, "Scoring the Indian," 243-4.
22 Gorbman, *Unheard Melodies*, 4.
23 Sheppard, "The Exotic Enemy," 328.
24 Gorbman, "Scoring the Indian," 238.

white protagonist.[25]

But these clichés are used not only because of their utility, or because the cultures they represent are also narratively stereotyped, but also because a Western audience is unlikely to interpret authentic ethnic music correctly. Sheppard, paraphrasing Tiomkin, says that the "'authentic' music of exotic peoples would have little impact on the audience."[26] According to Prendergast, "Oriental music would have little dramatic effect" on the Western film viewer because he/she "simply does not understand the symbols of authentic Oriental music as he does those of Western music."[27] The Romantic idiom, and its cultural stereotypes, are entrenched in common practice because their meanings are well understood by the audience; the Western listener speaks this language fluently. How could a listener unfamiliar with another language understand its subtleties in the way afforded by the automatic recognition of the ready-made explicit symbols of the classical Hollywood score? This issue might seem one of cultural imperialism, says Gorbman, but it is really one of understanding. She claims that the understanding of another ethnic music requires mediation, either through education or some kind of translation; "How can an Osage or Apache chant 'mean' to a Euro-American listener?"[28] Thus clichés are used because their signification is a familiar one. But perhaps this is overly simplistic. If all that is needed is for the viewer to recognize the Other musically, then comprehending non-Western music in a deep way, understanding it, seems unnecessary. If a Western audience is limited in their understanding of non-Western

25 Gorbman, "Scoring the Indian," 238, 240.
26 Sheppard, "The Exotic Enemy," 328.
27 Prendergast, *Film Music: A Neglected Art*, 214.
28 Gorbman, "Scoring the Indian," 237.

musics, they might not be conversant with the symbolism of those musics—not being able to decipher if they are appropriate for the scene or not—but they can still serve as a crude marker of another culture. For instance, one does not need to understand Indian music for a sitar to signify Indian-ness.

Sheppard, Gorbman, and Prendergast's arguments, however persuasive, are somewhat dated. Gorbman's analysis ends with a 1990 movie; cultural and musical currents in the United States have continued to shift in the intervening years. The film *Dances with Wolves* emanated from society more sensitive to cultural difference; if anything, this trend has continued—perhaps one reason for the virtual demise of the Western and its associated Indian cliché. Western audiences are increasingly aware of cultural diversity, and with the interest in "world music," have new knowledge of ethnic instruments and musical styles. Scholarship is currently silent on any change in the use of ethnic musical clichés in recent films; though Orientalist and Native American stereotypes continue to be used, perhaps the spread of world music and the promotion of diversity has led to more sensitive musical and narrative portrayals. At least by the late 1990s, for *Seven Years in Tibet* and *Kundun*, composers have begun to use the "correct" indigenous instruments for their musically represented cultures.

5.3 Minimalism and Non-Western Culture

As mentioned in Chapter 1, minimalism typically does not possess the sort of codified conventions that allow classical Hollywood Romantic scores to demarcate temporal and geographical information so easily. But that is not to say that this musical

technique has been left untouched by non-Western ideas. John Corbett, in his essay "Experimental Oriental: New Music and Other Others," has described how minimalism relates to two different kinds of Orientalist cultural appropriations: "conceptual Orientalism" and "contemporary *chinoiserie*." Conceptual Orientalism employs philosophies, techniques, or ideas roughly derived from Asian sources instead of directly referencing the sounds or using the instruments of indigenous cultures. According to Corbett, it is "not about 'sounding' non-Western."[29] Contemporary *chinoiserie*, on the other hand, does seek to imitate other musical traditions; "it is specifically the exotic sounds, textures, instruments, voices, and shapes of non-Western music that are appropriated for use in a new-music context."[30] Even though conceptual Orientalism might not reference a specific music, it is Orientalism; the composer has still appropriated other cultural ideas for his own use, what Corbett terms "metaphorical microcolonialism."[31]

Minimalism, Corbett proclaims, has dabbled in both kinds of Orientalism. The four original American minimalists were all influenced by non-Western musical traditions: Young, Riley, and Glass by Indian music, Reich by African drumming, Balinese music, and Hebrew cantillation.[32] In the early years of the musical style, some pieces resembled their ethnic musical influence. La Monte Young's *Tortoise*, with its

29 John Corbett, "Experimental Oriental: New Music and Other Others," in *Western Music and Its Others: Difference, Representation, and Appropriation in Music*, eds. Georgina Born and David Hesmondhalgh (Berkeley: University of California Press, 2000), 170-1.
30 Corbett, *ibid.*, 172.
31 Corbett, *ibid.*, 166.
32 David Nicholls, "Transethnicism and the American Experimental Tradition," *The Musical Quarterly* 80, no. 4 (1990): 582.

drones and improvisation, could be heard as echoing Indian music. Reich's *Drumming*, with its cyclical polymeter and instrumentation, nods to West Africa.[33] But this was not Reich's stated intent. As he remarks in his *Writings About Music*, "The least interesting form of influence, to my mind, is that of imitating the sound of some non-Western music ... Instead of imitation, the influences of non-Western musical structures on the thinking of a Western composer is likely to produce something genuinely new."[34] To avoid being too literal in his Ghana-influenced *Drumming*, he decided to not use real African instruments. According to Corbett, *Drumming* was far enough from real Ghanian music to "obscure the connection," though to other listeners the connection still seems audible.[35]

But while clear ethnic references in sound—contemporary *chinoiserie*—might have been recognizable in earlier concert works, Nicholls claims that this is not true of Reich's pieces since the 1980s.[36] And though Glass adapted Indian ideas for his additive and subtractive processes, Nicholls asserts that since around 1980 "transethnic elements have been effectively banished from his compositional technique."[37] This statement is not entirely accurate. Glass's recent *Orion* uses non-Western instruments such as pipa and didgeridoo, as well as melodic and rhythmic materials, but this is an exception rather than the rule; this 2004 work uses *chinoiserie* in a nod toward the multicultural meeting of the Olympics, for which it was commissioned.[38]

---

33 Corbett, *ibid.*, 173.
34 Reich, *Writings about Music*, 40.
35 Corbett, "Experimental Oriental," 174.
36 Nicholls, "Transethnicism and the American Experimental Tradition," 584.
37 *Ibid*., 585-6.
38 Philip Glass, "Orion," http://www.philipglass.com/music/compositions/orion.php (accessed 27 Nov 2008).

Thus, while decorative Orientalism might have been a part of earlier concert-hall minimalism, it has nearly disappeared by the era of the films analyzed in this study. By the 1980s, American minimalist concert music does not easily fit Brownrigg's conventions for indicating time and place; the musical idiom does not typically use or imitate ethnic instruments, and neither does it employ melodic or rhythmic material hinting toward a certain culture. Though influenced by non-Western musical traditions, this music is not a clichéd or parodying exoticism. Instead of sounding like ethnic musics, the minimalism of the concert hall is now primarily conceptually Orientalist. This non-Western influence creates a difference from the conventional scoring style, but a non-specific Otherness that does not point toward a particular time or ethnic group.

5.4 Minimalist Film Music and Culture

But though this is true for the American strain in concert music, this does not cover non-American minimalisms, and does not mean that these clichés and conventions *cannot* be used in minimalist film music. Native American drumbeats and pentatonic Orientalist stereotypes are conceivable within the confines of the minimalist technique, they simply are not part of its current concert hall idiom. Though non-specificity in relation to other cultures, time, or location is usually the norm in minimalist film scores, they grapple with this narrative cueing function in a variety of ways. In Michael Nyman's scores, he may recall different periods and places in Western history. Philip Glass's film music shows a multiplicity of approaches when faced with cultural alterity. An examination of these composers' works shows how minimalist scores deal musically

with the Other—whether they use established conventions or stereotypes, and how their work might otherwise differ from classical Hollywood scores.

Unlike his American counterparts, Michael Nyman claims a style influenced by rock and his European heritage, not ethnic musics, and is known for musical borrowing in his music, including his film scores. For instance, the music of *The Draughtsman's Contract* (1982), set in 17th century England, borrows from contemporaneous Purcell.[39] His score for *The Piano* (1992), fitting one own Brownrigg's conventions for suggesting time and place, uses variants on Scottish melodies to acknowledge the protagonist's origins.[40] Though Nyman might employ this convention, he thoroughly integrates the melodies within his musical style, and does not use timbral cues like the bagpipe. Drawing from the Western tradition, Nyman's scores may give a sense of time and place, but a familiar one, not a non-Western Other.

Though Nyman may indicate other historical periods or national identities within a European context, he has not been called upon to mark non-Western cultural alterity. How might the minimalist technique interact with films that do present cultures and ethnic groups outside the Western tradition? In *Koyaanisqatsi*, *Mishima: A Life in Four Chapters*, and *Kundun*, Philip Glass's music is used in films that nod toward Native American and modern Western culture (*Koyaanisqasi*), Japan (*Mishima*), and Tibet (*Kundun*), and does so in distinctive ways.

39 Russell and Young, *Film Music*, 97.
40 Siôn, "Michael Nyman."

5.4.1 *Koyannisqatsi*

In *Koyaanisqatsi* (1982), Glass's music does not seem to use any obvious ethnic musical clichés, though it does musically mark the difference between traditional and modern cultures. The film begins with *larghissimo* minimalist music, with a bass voice chanting "Koy-aan-is-qat-si," a Hopi word meaning "life out of balance." The chant-like vocals could be considered a marker of alterity—as the practice is more typical of cultures outside the dominant Western one or of pre-modern European music traditions such as plainchant—but it does not point to a specific ethnic group (the origin of the word is perhaps unknown to the audience). Its linkage to a specific culture is instead accomplished by the filmic image: one of the shots with which this chant is associated is of Native American pictographs inscribed upon a rock face. Because they are the only human-like figures in this sequence, the human voice chant seems to attach itself to them, as emanating somehow from the pictographs or from the culture that they represent—an ancient Native American one. This low-pitched, slow-tempo music, associated with pictographs and then images of the natural world, is later contrasted with frenetic, higher-pitched music accompanying the technological world of today, as in "The Grid" (see Chapter Three). Thus Glass in *Koyaanisqatsi* uses not Native American musical conventions, but tempo and register to differentiate an ancient culture from the modern Western one. But though this cultural marking is not musically stereotypical, it does promote a cultural cliché. By its association with a slower, calmer tempo, ancient Native American culture is presented as a slower pace of life, one which is closer to the natural world. This unity with nature is promoted by the use of the pictograph; Native American

art is literally part of the earth, inscribed upon it. Modern society, with its *presto* tempo, is presented by the film and score as mechanizing, alienating. The idea of the Native American as more attuned to nature, and modern man apart from it, is a stereotype Reggio structured the film to present.

5.4.2 *Mishima: A Life In Four Chapters*

Glass's portrayal of ethno-cultural alterity takes another turn with *Mishima: A Life in Four Chapters* (1985, directed by Paul Schrader). An avant-garde biopic, it explores the life and work of Japanese author Yukio Mishima. The movie is composed of three distinct filming styles: a more realistic, documentary style in color to depict the last day of Mishima's life; grainy black and white for flashbacks into Mishima's past; and rich color and stylized sets depicting parts of three of his novels. The music is, likewise, made up of three elements that begin to meet near the end of the film. There is orchestral music, string quartet, and orchestral music featuring a militaristic drum tattoo; the full orchestra is associated with stylized depictions from his novels, the string quartet with the biographical flashbacks, and the drum tattoo music is associated with Mishima's last day.[41]

For *Mishima*, Glass chose not to employ Japanese signifiers: "If I had orientalized the music it would have been a cheap shot."[42] Amongst the different musics, only the orchestral title music can potentially be read as acknowledging Mishima's Japanese

41 Russell and Young, *Film Music*, 131.
42 Aljean Harmetz, "Filming a Japanese Writer's Dramatic Life—and Death," *The New York Times*, 30 Dec 1984, Section 2.

identity in a conventional way. "Opening" begins with amorphous rising music; it features string tremolos followed by chromatic ascents, as well as wind chimes. After its dramatic crescendo ascent, the music becomes more typical Glassian minimalism with the arrival of the film title, with one main motive performed by either chimes or a synthesized simulacrum of chimes. The use of wind chimes and then real chimes could perhaps be interpreted as hinting toward Japanese alterity. By itself, there is nothing "Orientalist" about the chimes, but a potential relation with the stereotyped gong is activated when the music is anchored by the clearly Japanese-inflected title image, a red rising sun. Although the music could be read as Orientalism because of the gong-like chimes, the music does not require this reading; it certainly does not partake of pentatonicism, which is much more clearly affiliated with the Far East. Indeed, the same cue, "Opening," is used in *The Truman Show* when Truman escapes the dystopian soundstage of Seahaven (see Chapter 7.2.1). Truman Burbank is certainly not Chinese or Japanese, nor is the culture represented. If this music *required* an Orientalist reading, its use over Truman's escape would suggest, perhaps, that he leaves Seahaven only to arrive in Japan. But in *The Truman Show*, the music, lacking the filmic anchor of *Mishima*, does not suggest the Far East.

Instead of a stereotypical cultural connotation, "Opening" is used in *The Truman Show* at the denouement, just as it is in *Mishima*; the music is used not only for the title, but again when one of his literary characters and then Mishima himself "unite the pen and sword" by committing seppuku. While this act is certainly alien to Westerners, it is by this action—and through other Japanese elements of the film such as the primary

speaking language (Japanese) and the set of the Golden Pavilion—that his cultural alterity is foregrounded, not through the use of musical conventions. The nature of the narrative suggests why no clichés are used. In the classical Hollywood film, such conventions are used to signify culture efficiently, and are typically associated with stereotyped characters that act as foils for the white protagonist. But Mishima is no stereotype. Instead, he is a complex character in a Westernized Japan, and there are no Westerners in the film for him to act as a foil against. And the Orientalist cliché is not necessary here to tell the audience of the Japanese setting: the spoken language, the sets, the concentration on the samurai tradition (closely associated with Japan), and even the film's name give enough information to clearly convey specific ethno-cultural information to the audience. Though the score might not employ what must be read as an Orientalist convention typical of the classical Hollywood film, minimalism's conceptual Orientalism—its non-culturally specific sense of alterity—perhaps contributes, along with the Japanese language and sets, to give Mishima a sense of Otherness.

5.5 *Kundun*

While *Mishima* and *Koyaanisqatsi* might not employ typical Asian or Native American musical codes, Glass's score for *Kundun* is different.[43] This more commercial film employs such conventions, but in a seemingly less superficial way than do classical Hollywood scores. Its minimalist style also allows it to function in a way Romantic

43 N.B.: "Kundun" is an affectionate name given to the Dalai Lama. The fourteenth Dalai Lama's given name is Tenzin Gyatso, but this is used rarely in the film, so I refer to him as either "Kundun" or "the Dalai Lama."

scores could not: as an Other to traditional tonal music. The 1997 film, directed by Martin Scorsese, is a biopic set in Tibet; it depicts the discovery of the fourteenth Dalai Lama, his childhood, installation as head of government and religion, and eventual flight to India to escape the Chinese "liberation." The director chose as his composer for the film Philip Glass, who himself is a Buddhist and has known the Dalai Lama since 1972.[44] Scorsese recounts that he had wished to work with Glass for a long time, and *Kundun*—as a topic of shared interest—provided a subject for collaboration, an unusually close one that involved Glass's input even at the script development level.[45]

When describing his goals for the film's music, Philip Glass said, "I told Marty the score has to ... create unmistakably the sense of place—the music would transport you immediately from the very first notes to an exotic (by Western standards) environment."[46] Glass's aim, to evoke a sense of time and place, is something minimalist music, usually lacking overt ethnic stereotypes, struggles to do. With the first sounds of the film, it appears that Glass reverts to the traditional score's clichéd means for depicting alterity. *Kundun* begins with the clatter of cymbals and then a crescendoing gong that musically arrives with the film's title; as noted above, the gong is one of the Orientalist markers identified by Bazelon.[47] But Glass's score, though initially hinting towards stereotypical signs conflating all Asian cultures, proves to be more culturally sensitive.

---

44 Philip Glass, "A Reflection, Like the Moon on the Water: Philip Glass on *Kundun*," interview by David Morgan, in *Knowing the Score: Film Composers Talk About the Art, Craft, Blood, Sweat and Tears of Writing for Cinema* (New York: HarperCollins Publishers, 2000), 239; Martin Scorsese, Soundtrack Notes, Philip Glass, *Kundun: Music from the Original Soundtrack*, Nonesuch 79460-2.

45 Scorsese, *Kundun: Music from the Original Soundtrack*, *ibid*.; Glass, "A Reflection, Like the Moon on the Water," *ibid.*

46 Glass, "A Reflection, Like the Moon on the Water," *ibid.*

47 Bazelon, *Knowing the Score*, 109.

Instead of using pentatonicism (as a classical film score might) to represent Tibet, the composer uses real Tibetan instruments. This is not as clichéd as pentatonic *chinoiserie*, but still follows the conventions traditionally used by the classical film score to accomplish this task (as mentioned in Brownrigg). Glass uses indigenous instruments and voices to evoke the narrative's setting—Tibetan ceremonial horns (*dung-chen*), cymbals, and recordings of Tibetan Buddhist Gyuto and Drukpa Order monks—and also uses Western instruments in imitation of Tibetan ones.[48] All these instruments are used within his minimalist idiom; he does not (except in a few instances of diegetic music) attempt to recreate the Tibetan style.

The use of culturally appropriate instruments instead of stereotypical Orientalist musical clichés indicates, perhaps, a change in Western culture—or at least a difference in Glass's attitude toward Far Eastern cultures from that of earlier, classical film scorers. Western society has become more sensitive to cultural difference, and, though any type of cultural conflation is potentially insensitive, this particular musical choice is certainly fraught with political undertones. Using pentatonic Orientalist clichés for Tibet would musically conflate it with other Far Eastern cultures, including China, that have long been signified with these stereotypes. Tibet is now known in the West as a country that communist China invaded and continues to occupy. Signifying pre-invasion Tibet with music more closely associated in the Western imagination with China would not musically differentiate Tibet from its occupier, creating dissonance with the currently

48 Instrumentation listed on the soundtrack recording credits. Philip Glass, *Kundun: Music from the Original Soundtrack*, Nonesuch 79460-2; Brownrigg, "Hearing Place: Film music, geography, and ethnicity," *ibid*., 318.

held Western view of the two countries as culturally distinct.

If Glass's use of indigenous instruments to mark a different culture—a conventional device—were the only part of his score to nod toward Tibet, then Scorsese might as well have chosen a composer of more conventional scores, because this is equally possible within the Romantic idiom. For example, John's Williams's score for *Seven Years in Tibet,* released the same year as *Kundun* (1997), employs the same indigenous sounds: Tibetan horns, cymbals, and Tibetan monk chanting.[49] Why, then, employ minimalist techniques to provide a sense of alterity? One reason may be that musical references to Tibet within a minimalist score are different in effect from a classical Hollywood score using established Asian codes, interacting in a less superficial way. It is not that Glass simply uses ethnic instruments as a veneer or an auxiliary within a musical style that has nothing to do with the culture or ethnic group—as employing a melody on koto within a Romantic idiom might hint at a Japanese setting—but the minimalist technique itself has elements in common with Tibetan culture *as it is portrayed in the film*. As Brownrigg has noted, "While Williams' score [for *Seven Years in Tibet*] responds to the action on screen, the form of the music following the content of the image track, the form of Glass' score seems to echo the *thematic* content of the

49 But Williams's score diverges from Glass's. Williams at the beginning of the *Seven Years in Tibet* uses indigenous Tibetan instruments alone—without Far Eastern clichés—to mark Tibetan cultural alterity. Instead of combining the instruments with his Romantic style (as Glass uses them within minimalism), this music is unmediated for Western ears—sounding completely alien, not like music but more like sound effects. This choice makes sense at the film's opening, as the culture is unknown by the Western protagonist, and is imagined by him as only Other. But when the protagonist Heinrich enters Tibet, Williams slips into Orientalist cliché. When Heinrich arrives in the country, Williams uses pentatonic, portamento stings over a Tibetan horn drone or its imitation (37:01). A pentatonic melody is again employed, this time with bamboo flute, when the Dalai Lama uses his telescope (53:18). This employment of *chinoiserie* conflates Tibet with all of the Far East. For more information on this score's Orientalisms, see Brownrigg, "Hearing Place: Film Music, Geography, and Ethnicity," *ibid*., 313-5.

film"—the cultural/religious elements of *Kundun*.[50]

One of the characteristics of minimalism that resonates with Tibetan tenets in *Kundun* is cyclic repetition. Just as minimalist music features motives repeated multiple times, Tibetans are said to believe in a cyclical existence; the very protagonist of the film is presented as the fourteenth in a cycle of reincarnated Dalai Lamas.[51] But it is not only the congruence between the musical technique's repetition and reincarnation that proves an enabling similarity. Another attribute of minimalism is that the combination of cyclic repetition, long piece length, static instrumentation and harmony can create a hypnotic sense. This impression spurred one of minimalism's original names, "trance music,"[52] and has also prompted reviewers to label minimalism as ritualistic, meditative, or serene.[53] Film critics noticed this effect in Glass's music for *Kundun*, calling it "mesmeric" and "one of Philip Glass's most hypnotic scores."[54] The meditative nature projected by the music is also shared by Tibetan Buddhism, whose proponents practice the ritualistic chanting of mantras and meditation as part of their quest to achieve enlightenment.[55] The score of *Kundun* could thus be labeled as an instance of Leydon's "mantric" trope, where "repetition suggests access to mystical or spiritual

---

50 Brownrigg, "Hearing Place: Film Music, Geography, and Ethnicity," 317.

51 Keila Diehl, *Echoes from Dharamsala: Music in the Life of a Tibetan Refugee Community* (Berkeley: University of California Press, 2002), 266.

52 The name "trance music" is used to describe minimalism in newspaper reviews such as Robert Palmer, "Trance Music—A Trend of the 1970s," *New York Times*, 12 Jan 1975.

53 John Rockwell, "Music: Reich Meditations," *New York Times*, 19 May 1973; John Rockwell, "Music and Theater Offered at Kitchen in a 3-Part Concert," *New York Times*, 21 Feb 1973; Larry Austin, "Music is Dead—Long Live Music," *New York Times,* 6 July 1969, Section D.

54 Tom Shone, "Transcendent Meditation," *Sunday Times* (London), 5 April 1998; Jay Carr, "*Kundun* Wins its Quiet Gamble on Tibet," *Boston Globe*, 16 January 1998, Section D.

55 Brownrigg, coming to a similar conclusion, remarks that the thematic content of the film echoed by the music is its "trance-like, religious experience," though he does not tie this effect to its source in specific musical characteristics nor to Tibetan meditation or mantra.

transcendence," the blissful state toward which the Buddhists strive.[56] The meditative or hypnotic sense of the score also seems to suspend time. This timeless, static quality is also foregrounded by Scorsese's filmic vision of Tibet; if it were not for the subtitled dates, the era of the film's opening third could not be guessed—the Tibetans are presented as an ancient culture, with no evidence of modern technology except for guns.

But do these similarities, the intersections of musical qualities and Tibetan cultural ideas promulgated by Scorsese's film, elevate the score's portrayal of cultural alterity above stereotype, transcending convention? Unlike a conventional score, *Kundun*'s music does not only superficially indicate another culture with an outer façade of ethnic instruments, but with its intrinsic musical characteristics aurally externalizes cyclic existence, meditation, and timelessness—elements brought out by the film's narrative. But are these elements representative of real Tibetan culture, or simply constitute a more contemporary stereotype than pentatonic *chinoiserie*? Perhaps they could be described as simply reflecting a new, more sensitive simplification: what the West (or even just Hollywood) now considers Tibet to be (or to have been). According to Tibet scholar Peter Bishop, travel authors have consistently mythified the country as a forbidden land, "Shangri-La," and even until the 1959 Chinese takeover, Westerners envisioned Tibet as "unchanged and unchanging, a country frozen in time, impervious to the twentieth century, aloof, mysterious."[57] According to anthropologist and ethnomusicologist Keila Diehl, this romanticized view was of an insular "medieval

56 Leydon, "Toward a Typology of Minimalist Tropes."
57 Peter Bishop, The Myth of Shangri-La: Tibet, Travel Writing, and the Western Creating of a Sacred Landscape" (London: Athlone, 1989), 209.

sanctuary of natural and spiritual mystery."[58] This trope of Tibet has been employed by Tibetans themselves for a sense of cultural identity, and has been exploited by the Dalai Lama and the Tibetan government-in-exile for political purposes—as propaganda or public relations, attempting to convince the West of the value of its claims over China's.[59] This idealized, contemporary cliché of Tibet—as a static land of spiritual mystery—is what Glass's score seems to foreground with its meditative, slowly-changing, cyclical score.

5.5.1 Minimalism and Tibet's Other

In this way, Glass's music for *Kundun* uses a typical convention for creating a sense of cultural identity: indigenous instruments and their imitations within a Western musical style. These instruments, as in classical Hollywood scores, are used as an exotic veneer; however, the minimalist technique itself has elements in common with the film's presentation of Tibetan culture. Though this makes the score seem to have a deeper relationship with the culture, different in effect from conventional scores because it partakes in thematic ideas of the film, the view of Tibet presented by the music could be perhaps considered as a stereotype, albeit a contemporary one. Glass's score for *Kundun*, however, has one more important feature: its use of Tibetan instruments and lack of pentatonic clichés allows it to function as an Other to *chinoiserie*, and its use of minimalism allows it to function as an Other to traditional tonal music.

58 Keila Diehl, *Echoes from Dharamsala*, 21.
59 Diehl, *ibid*., 24, 266.

For all of *Kundun*, minimalist music is used to represent Tibet and its people. In the first part of the film, before the Chinese invade, Glass's music employs numerous exoticisms to portray the Tibetans as culturally Other. Some cues sound like Glass's normal concert style—the Regent's recounting of his vision of the Dalai Lama (19:49-20:45), with its flute arpeggios and strings, would be at home in *Koyaanisqatsi*—but the majority of the score in this first section is strongly inflected with nods toward alien color. The composer integrates indigenous instruments with his minimalism, and these are used frequently and at a prominent dynamic. There is a higher proportion of exotic-sounding scale structures than normally employed within his concert hall style; for instance, when the young Dalia Lama first visits his summer palace, Glass composes a flute melody in the G Locrian scale (fades in around 33:26).

Glass's music is not authentically Tibetan, but the use of indigenous instruments within a more familiar musical style (minimalism) serves a translating function. As discussed earlier in this chapter, an unfamiliar musical tradition can only serve as a crude marker of alterity, and cannot serve a more nuanced narrative function. Indeed, in *Seven Years in Tibet*, the Tibetan music at the beginning of the film seems completely alien, more of a sound effect than music; for this listener, it proved so distant from experience that it could only serve as alien signifier, not as a mediating device.[60] Glass acknowledges that *Kundun*'s "images and the story are so exotic by our familiar standards," and recognizing the cultural gap, he intended the music to provide "a bridge between the audience and a culture ... we had to create a doorway into that world so that

60 Westerners familiar with Tibetan music would not have this difficulty.

people could look at it and have some familiarity with it."[61] Instead of using an Orientalist cliché—and its politically-charged associations—to build this bridge, the integration of indigenous sounds within a minimalist idiom translates something of Tibet's music into a form that can be understood by a Western audience.

The lack of Far Eastern pentatonic stereotypes for the Tibetans frees them for another use: for the Chinese. When the PRC Army invades, a militaristic drum beat is first joined by Chinese instruments, and then a chorus singing, in Chinese, a pentatonic song (1:03:51-1:04:40). That the army shown is Chinese is suggested by the dialogue preceeding their appearance ("The Chinese have invaded"), but is firmly established by both the visuals and music. First, the viewer sees a portrait of Chairman Mao, then the army, carrying PRC flags, enters; the bizarre camera angle (tilted counterclockwise about -30° so that they are marching up from the bottom left) marks them as an ominous threat. Freely partaking of the traditional *chinoiserie* cliché, the music also labels them as Far Eastern. The deployment of a musical stereotype here is much like its use in classical Hollywood films. An efficient signifier, it immediately identifies the culture to the audience, and is also a sign for characters and a culture that are presented as a stereotype. The Chinese characters of *Kundun* lack depth; Chairman Mao, especially, is presented more as a caricature than a complex individual. The Chinese here are simply a foil—albeit not for a white protagonist, but for the sympathetically-presented Tibetan culture. Just like the Native Americans in early Westerns, the Chinese are an ethnic Other, an

61 Philip Glass, "A Reflection, Like the Moon on the Water: Philip Glass on *Kundun*," interview by David Morgan, in *Knowing the Score: Film Composers Talk About the Art, Craft, Blood, Sweat and Tears of Writing for Cinema* (New York: HarperCollins Publishers, 2000), 239

enemy with which the protagonists must struggle.

Though initially marked with pentatonicism—a sign which recurs when the Dalai Lama gets his photograph taken with Mao—the Chinese are henceforth musically indicated with communist revolutionary choral anthems in the style of "The East is Red," i.e., a Western, tonal musical idiom. The first of these songs is played over a loudspeaker installed in Lhasa; the recording blares in the night while the Dalai Lama meets with his prime ministers (1:26:26-1:27:28). Disturbed by the noise, Kundun complains, "They have taken away our silence." More revolutionary tunes soon follow, a men's chorus as the Dalai Lama travels to China (1:27:59-1:28:42), and a diegetic children's choir welcoming his car when he arrives at Mao's headquarters (1:28:57-1:29:54). The choir fades into a speech given by Mao that ends with, "The mission of China is to bring progress to Tibet. We welcome you, Tibet, back to the motherland." Progress, for Mao (as presented in the film), is industrialization, the introduction of new technologies: essentially a Westernization of the culture. The use of a tonal musical idiom for China—associated with the technologically advanced culture from which it came—aurally projects this drive. Instead of pentatonicism, usually associated with China as a marker of a timeless culture, Western-style anthems proclaim its modernity relative to Tibet.

This presents an unusual dialectic. Minimalism, as part of musical experimentalism, is usually presented as an Other to the Western tradition. In *Kundun*, minimalism is indeed deployed as a musical Other to the West, as representing Tibet, an Asian culture portrayed sympathetically. But in this score, traditional tonal music is representative of yet another Asian culture—here cast not as timeless, but as a ruthless

enemy. Thus instead of its normal role in classical Hollywood film as a music with which to identify against a foil of ethnic music, Western tonal music signifies alterity against which the protagonists (with their ethnic/minimalist music) struggle. In *Kundun*, minimalism is an Other, but Western tonality signifies the Other's Other.[62]

The influence of the Chinese on Tibetan culture is not shown only through the introduction of pentatonic and tonal Western musics into the score. It is also revealed, more stealthily, by the use of silence and the change in the music employed to represent Tibet. The Dalai Lama's complaint that the Chinese "have even taken away our silence" at first strikes one as utterly false. The film is scored thickly; of the approximately two-hour narrative, only around thirty minutes are without diegetic or non-diegetic music. Before the first serious discussion of China between the young Dalai Lama and the Kashag council (sequence beginning at 50:52), gaps between musical cues are always less than two minutes, frequently running only a few seconds before the next cue begins. With this near-continuous scoring, Tibet seems far from silent; but this music is understood as not entirely diegetic, but rather the aural sigifier of the culture, emanating somehow from Tibetanness. The Dalai Lama's statement, of course, refers to diegetic sound. But on a symbolic level, the complaint takes on new meaning. The revolutionary song has not taken away Tibetan silence, but has replaced the non-diegetic emanation of Tibetanness—as expressed through Glass's score—with diegetic Chineseness.

This stripping away of Tibetan culture is expressed not only through its musical

62 The roles of minimalism and Western tonality also seem reversed in another way. Minimalism, a product of the 1960s, is more modern than the tonal idiom. But here, minimalism is a marker for a timeless, medieval culture; Western tonality as a reflection of an impulse toward modernization.

replacement, but—ironically, considering Kundun's statement—by its silencing. As previously stated, the first part of the film, before there is serious mention of China's immanent threat, is nearly completely scored.[63] The longest time between musical cues was 1:46 (17:51-19:37). But when the Dalai Lama has a discussion with his council on both the arrest of his prior regent and how the Chinese "are once again trying to convince the world that Tibet belongs to them," there is the longest musical silence of the film, nearly six minutes (50:52-56:39). Another pregnant pause ensues when the radio announces Tibet's surrender to China and then the Chinese General Chiang Chin-wu requests that the Dalai Lama sign the seventeen-point agreement (1:16:48-1:19:43). Silence also greets Kundun's meeting in China with both the PRC council and Chairman Mao (1:33:14-1:35:24).

The association of silence with the Chinese repression of Tibet is most poignantly displayed when the Dalai Lama visits his childhood home on the way back to Lhasa from Peking (silence 1:36:55-1:40:26). Where in his youth the home had been purely Tibetan, now symbols of Chinese "progress" are everywhere. A red Chinese banner is over the door, new metal farm implements are strewn about the courtyard, and an antenna rises from the chimney. A Tibetan matriarch offers butter tea in a Tibetan welcoming ceremony, but when another woman attempts to offer butter tea inside the home (in a chinaware cup), a Chinese soldier prevents her, gesturing no. A portrait of Mao is displayed on the wall, while Chinese calligraphy plasters the walls and a column, in black

63 China is mentioned in passing twice before this, but this is the first time when it is mentioned that China is trying to claim Tibet as part of their territory.

paint over whitewash. When the Dalai Lama leaves, he asks the Tibetan matriarch if she is happy. She replies, crying, "I am very happy and prosperous under the Chinese Communist [she breaks down in sobs] Party and Chairman Mao Tse-tung." Just like the walls, the Chinese have whitewashed over Tibetan culture, repressing it, replacing it with their own symbols. Instead of Tibetan instruments, there is eerie silence.

But it is not only through the use of silencing that the soundtrack auralizes the cultural domination brought about by the Chinese occupation. Where the music of the first part of the film had prominently featured Tibetan instruments and "exotic" scales, the minimalist music after this silent scene seems stripped of much of what hitherto represented Tibetan culture. Except for music that accompanies Tibetan cultural rituals such as the oracle, Tibetan instruments are used more sparingly, and at a lower dynamic. It is difficult to quantify a cue's "Tibetanness," but music such as that at 1:56:32-1:58:11, with its orchestra and choral "Ahs," sounds much more like Glass's typical concert style than most of the music in the first part of the film. With this sublimation of exoticism, Glass musically represents the loss of Tibetan culture through Chinese suppression. Conversely, the blast of Tibetan ceremonial horns when the Dalai Lama reaches India suggests that the culture and its traditions will continue despite the takeover of its homeland.

The use of minimalism has advantages here over classic Hollywood scoring practice. Though Glass may have used fewer indigenous or exotic nods toward Tibet near the end of *Kundun*, the score is still minimalist. This musical style has been closely associated with Tibet since the beginning of the film, and continues to be associated with

the culture to the end. Though it has sublimated some of its exoticisms, the score still functions well as a signifier of cultural Otherness because of its conceptual Orientalism, its non-Western inflection. If Scorsese had employed a conventional score, it would have been difficult for it to continually proclaim Tibetan alterity if stripped of exoticism. Such are the possibilities inherent in the minimalist technique. It may use only a difference in tempo to mark cultural differences (*Koyaanisqatsi*); in films like *Mishima*, it may leave the bulk of cultural identification up to elements of the *mise-en-scene* or dialogue. But its origins in conceptual Orientalism—its non-culturally specific sense of Otherness—allow it to continue to signify alterity, even if more typical, classical Hollywood codified elements—like indigenous instruments—are stripped away.

CHAPTER SIX
MINIMALISM AND THE MATHEMATICAL GENIUS

6.1 Introduction

In addition to its use as a marker of alterity, minimalist techniques have also been employed to set apart certain kinds of thought processes. In the films *A Beautiful Mind* and *Proof*, minimalism again marks difference, but this time not what is typically thought of as constituting the Other, but the mind of the mathematical genius.[1] But why use minimalist techniques to mark the logical thought of mathematicians? One might think that integral serialism would be better suited to signify the mathematical, since that music is actually based on numbers and their ordering. But as other authors have noted, total serialism does not sound orderly to the untrained ear, but instead sounds very much like aleatoric or chance music—unordered, random.[2] Serial music is also (usually) quite atonal, and atonal music already has a clear culturally coded meaning in film: something terrifying or foreboding. Using a music associated with terror to mark characters doing math would cast either them or their actions as sinister. In both *A Beautiful Mind* and *Proof*, the geniuses are sympathetic characters (though unstable), and their mathematical

1 *A Beautiful Mind*, DVD, Directed by Ron Howard (2001; Bayonne, N.J: Universal Studios, 2006); *Proof*, DVD, Directed by John Madden (2005; Chicago, IL: Miramax, 2006).

2 Antokoletz holds that "Total control of all the parameters often produced the opposite effect: total randomness," while H.H. Stuckenschmidt claims that "The impression made by all these [total serialist] works, even on a listener who had read the commentaries beforehand, was one of chaos." Elliott Antokoletz, *Twentieth-Century Music* (Upper Saddle River: Prentice Hall, Inc., 1998), 485; H.H. Stuckenschmidt, *Twentieth-Century Music* (New York: McGraw-Hill, 1970), 214; quoted in Thomas B. Holmes, *Electronic and Experimental Music: Pioneers in Technology and Composition*, 2nd ed. (New York and London: Routledge, 2002), 101, NetLibrary, http://www.netlibrary.com.content.lib.utexas.edu:2048/ (accessed 18 Feb 2008)

ability is not menacing, but considered a gift. So although the construction of integral serial music might have much in common with mathematics, its cultural encoding and its chaotic sound make it an inappropriate choice.

Baroque music, with its cultural associations of intellectualism, might also seem like an excellent choice to portray the mathematician. Film music scholar Kristi Brown says, "Counterpoint is a technical process—it's invention using formulas—so people attracted to numbers would be drawn to it. He [Bach] played with musical figures the way a mathematician plays with numbers."[3] She notes that Bach's pieces have often been used over film images of characters fascinated with "highly organized patterns, ciphers, statistical detail, and systems of order," likely because that order is also true of Bach's music.[4] This seems suggestive, as the mathematicians in these films are certainly fascinated with patterns. But while Baroque music has been used with images of logical minds, Brown details that it is linked not simply with genius, but with genius gone psycopathically, cold-bloodedly mad—with serial killers such as Hannibal Lecter.[5] While the mathematicians in *A Beautiful Mind* and *Proof* are mentally unstable, they are not psychopaths. Because of the prevalent filmic association of Baroque music with malevolent genius, its use here would be misleading insofar as these characters are not malign.

So although both would seem an appropriate musical analogue to rational thought,

---

3 As quoted in Scott Timberg, "Is Bach playing? Look out!; When the composer's music arrives in a movie, it often means trouble. It's a psycho-killer favorite," *Los Angeles Times*, 24 Aug 2003, Section E.

4 *Ibid.*

5 *Ibid*., Kristi Brown, "Perfectly Executed: Bach's Music, Technology, and Violence in Film," abstract in *AMS/SMT Columbus 2002 Abstracts*, 98, http://www.ams-net.org/Abstracts/2002-Columbus.pdf (accessed 18 July 2007).

integral serialism and Baroque music prove problematic for representing mathematic ability in these films. As for minimalism, its linkage with the thinking of mathematicians is somewhat similar to its employment as an iconic sign for machine. There are several idiomatic expressions in English that draw a comparison between the logical brain and technology; for instance, your "cogs" or "wheels" are turning means that you are thinking furiously. But while in *Koyaanisqatsi* these wheels were literal (actual assembly line machines), in this case they are figurative. And they are the cogitations of human minds. So instead of employing synthesizer and inhumanly fast, mechanical precision, the minimalism used in these films is softer, more expressive, and features warmer instrumentation including thick strings.

But while it is a softer style, the attributes of minimalism still inform its use. There are several similarities that enable the coupling of this musical technique with math: mathematics is often considered an orderly discipline, full of patterns; these patterns often repeat. Perhaps filmmakers have made the connection because they consider minimalism orderly—it has a steady pulse and motives that repeat, and it often features some kind of pattern or process. Another reason for the link might be that minimalism can have a hypnotic sensibility. This trance-like state likewise occurs when these geniuses are lost in thought, ignoring what is around them to solve some problem with single-minded intensity. Minimalism typically lacks melody and other coded emotional signifiers; in conventional scoring, it is often melody that brings emotional import to a scene. Emotion is often considered right-brain activity, rationality and objectivity left-brain. The scores of *A Beautiful Mind* and *Proof* differentiate the

operations of the mathematician from more emotional scenes by using different musical techniques; whereas minimalist techniques represent logic, more conventional cues indicate emotion.

6.2 *A Beautiful Mind*

The 2001 film *A Beautiful Mind*, with score by James Horner, is a somewhat fictionalized biopic of the life of the Nobel Prize-winning mathematician John Nash. The film is in three parts: in the first part, Nash is at Princeton and Wheeler Lab, making mathematical discoveries while appearing sane, though unsociable. In the second part of the film, Nash's paranoia grows, and he is taken to an asylum, where it is revealed he has schizophrenia and has been "imagining" people and things that are not real. The third part shows Nash's attempts to overcome his mental illness, integrating into society and eventually winning a Nobel Prize.

Horner's music for *A Beautiful Mind*—beginning with its opening cue—brings out this story arc (see Example 6.1). As music that precedes any of the diegesis, the way to interpret this opening title music is left to hindsight; one must connect its motives with what they accompany later in the film. One possible meaning, however, is hinted at by the name Horner gives to the music: "A Kaleidoscope of Mathematics."[6] The composer himself links this music with math, though a viewer would be unlikely to know of this title and its associations on their initial viewing of the movie. Variants of this piece are

6 Titles were taken from the soundtrack recording. James Horner, *A Beautiful Mind: Original Motion Picture Score*, Decca 016 191-2 DH.

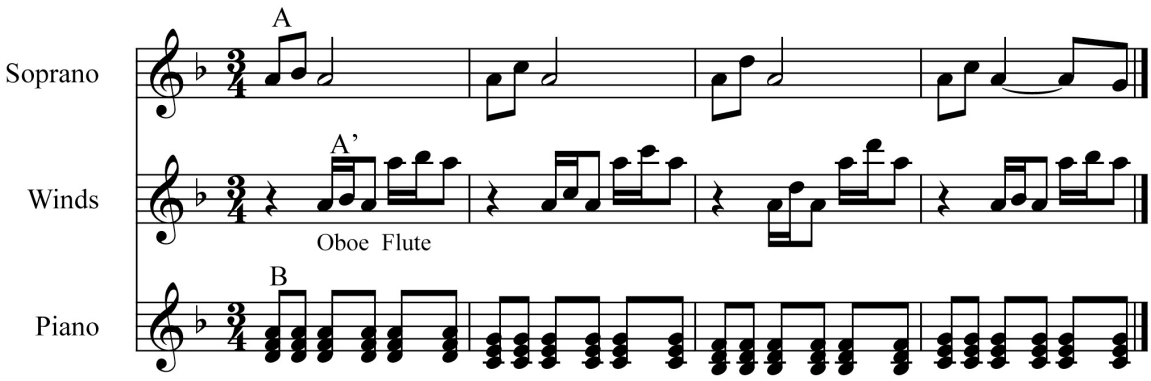
used several times in the first part of the film, always overlaid with visuals of Nash solving some kind of math problem. And this music always accompanies Nash—not other characters, even though many of them are also mathematicians—privileging his point of view, singling out only him and his ability. But this particular music is associated with the healthy operation of Nash's mind; it disappears in the second part of the film, when he succumbs to paranoia. In this section, the functions of his schizophrenic brain are represented by different music; what I call the "paranoia leitmotif" still employs minimalist techniques, but these techniques gradually disintegrate into chaos as Nash realizes his own illness. A derivation of the opening cue of the film is employed one more time, in the third section of the film, when he has overcome his illness and returned to mathematics.

But Horner does not utilize only minimalist techniques—as found in the title music, its variants, and the paranoia leitmotif—in his score for *A Beautiful Mind*. Minimalist techniques in their purest form are confined to representing Nash's rational deliberations, marking his mathematical logic. Much of the rest of the score is in a vein typical of a more conventional scoring style. Horner uses emotional underscoring in scenes such as 47:07, when Nash is romancing Alicia (who later becomes his wife) by a riverbank on a sunny summer day. The music here, as befitting its pastoral setting, is a gentle, lyrical duet of clarinet and oboe. At 47:53, the cue morphs into a piece of music that serves as a theme of love and hope throughout the film: "All Love Can Be." This romantic, lyrical string theme is emotional, its melodic nature quite unlike "A Kaleidoscope of Mathematics." It is the difference between these musics, and the fact

that only Nash's analytical mind is accompanied with derivations from "Kaleidoscope," that set his mathematical thought apart from other elements of the film.

But before discussing variants of "Kaleidoscope" and how they work in the diegesis as a signifier of mathematical genius, it is useful to discuss "Kaleidoscope" itself. As previously mentioned, it precedes the diegesis and thus initially has a "floating" signification; however, its title and later use with math-related images anchors its meaning. The initial twenty-four measures of "A Kaleidoscope of Mathematics" (Section A), its expository material, utilize minimalist techniques (see Example 6.1 for the motives of mm. 1-24, Example 6.2 for their ordering).

Example 6.1: Opening musical motives of "A Kaleidoscope of Mathematics" (mm. 1-24)



The title music begins in D minor with wordless soprano (a common instrument of minimalist composers such as Glass) on motive A, which is repeated verbatim a total of 6 times (see Example 6.2). On its second repetition, the oboe and flute join the voice, echoing it with a compressed variant of motive A, labeled A' in Example 6.1. The piano is added next (motive B), with rhythmically crisp repeated chords cycling from D minor

down to Bb major and back, and then the strings enter with an arpeggiated version of the piano chords (motive B-Arp, not shown in the score example).

Example 6.2: Order of motives in "Kaleidoscope" opening, mm. 1-24 (Section A)

Measures	1-4	5-8	9-12	13-16	17-20	21-24
Soprano	A	A	A	A	A	A
Woodwinds		A'	A'	A'	A'	A'
Piano			B	B	B	B
Strings					B-Arp	B-Arp

This initial section clearly employs minimalist techniques: there is a steady tempo, limited harmonic palette, cyclically repeating motives, and no real melody. The music changes in m. 25 to a sequential pattern in mixed meters (see Example 6.3). The sequential material develops the musical motives from the opening Section A.

Example 6.3: Sequence of mm. 25-34 of "Kaleidoscope"

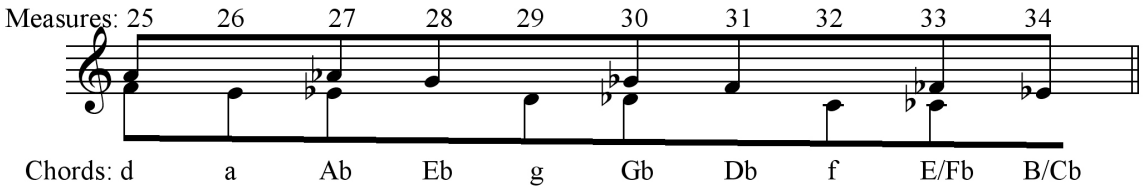
Measure	25	26	27	28	29	30	31	32	33	34
Chord	d	a	Ab	Eb	g	Gb	Db	f	E/Fb	B/Cb
Meter	3/4	3/4	3/4	2/4	2/4	3/4	2/4	3/4	3/4	3/4
Interval		+P5	-m2	+P5	+M3	-m2	+P5	+M3	-m2	+P5

After an initial ascent of a perfect fifth, one can see in Example 6.3's row labeled "Interval" that the sequential pattern of the chord succession is (-m2, +P5, +M3).[7] Though these measures do not as clearly follow minimalist techniques as the first twenty-four measures (the meter changes do not follow any clear pattern), the chord succession, the sequence itself, exhibits the kind of processive construction typical of minimalism. And these measures follow an exact process, a chord succession of (-m2, +P5, +M3) that

7 I am calling this sequence a chord "succession," not "progression," because this pattern is clearly nonfunctional from a tonal harmony basis—alternate chords being a tritone away.

features descending half-step voice-leading (see Example 6.4).[8] This half step descent is not continuous in any voice—there are common-tone held pitches like (Eb, Eb) in mm. 27-28—but some voice is always descending a half step. Because it is based on a process, has a steady pulse, is motivically-based, and lacks melody, mm. 25-34 could also be considered as employing minimalist techniques.

Example 6.4: Half-step voice-leading embedded in mm. 25-34 of "Kaleidoscope"



Following this sequence, there is a brass fanfare on a progression common to Glass's music: major chord—minor pedal $\frac{6}{4}$ of that chord—back to original major chord (mm. 35-37, Eb-minor pedal $\frac{6}{4}$-Eb). Following this fanfare, mm. 38-58 play with the developmental material of mm. 25-34 further, using primarily the same intervals between chords as the earlier section but completely mixing their order and direction (see Example 6.5 for a sample).

Example 6.5: Chords and their intervallic relations, "Kaleidoscope" mm. 38-47

Measure	38	39	40	41	42	43	44	45	46	47
Chord	ab	E	B	f#	D	f#	F	a	Ab	E
Interval	-M3	+P5	+P5	-M3	+M3	-m2	+M3	-m2	-M3	

8 This linear descent is implied by the chord progression. Without being able to consult the score, I cannot say if either this voice leading or that shown in Example 6.9 are actualized by any particular instrument, but these examples do accurately represent my aural impression of descent in these cues.

The directional changes and mixing of intervallic successions turns what was an orderly process into chaos. Not only is the earlier sequential process broken here, but the descending half-step voice-leading disappears as a result; for instance, there are no half-step relations from m. 40 to m. 43, only common-tone relations. Since these measures no longer follow the sequence or process of mm. 25-34, the music no longer seems minimalist.

Example 6.6: Structure of "A Kaleidoscope of Mathematics" (mm. 1-75)

Measures	1-24	25-34	35-37	38-57	58-62	63-74	75
Contains	Minimalist repetition	Sequential process, mixed meter	Eb-minor ped$\frac{6}{4}$-Eb	Sequence broken	a-Ab-a-Ab-a...	Minimalist, triplets on B motive	A major chord then caesura
Sections	A	B: development (cycling through keys, developing A section's motives)			Standing on the dominant	A': Recap of B motive shown in Ex. 6.1	

Measures 58-62 of "Kaleidoscope" are similar to a "standing on the dominant" section of a sonata, with an insistent alternation between the keys of A minor and Ab major (A minor is the "v" or minor dominant chord of D minor, the opening key). This is followed in mm. 63-74 with a recapitulation of the piano motive (B) from the opening of the piece, now in quick triplets in the original key, D minor (Section A'). The title music ends with an A major chord followed by a caesura when the diegetic images begin, with a professor saying "Mathematicians" (see Example 6.6 for the entire structure of "Kaleidoscope").

But how are we to interpret this music that has both minimalist (mm. 1-24, mm. 25-34, and mm. 63-74) and more chaotic, developmental elements (mm. 38-57)? As the

film plays out, one realizes that this music and its variants are used only over images of Nash doing mathematics. The opening piece's initial motives and sequential material return over these images, but are not as chaotic as in mm. 38-57 of "Kaleidoscope." This suggests that "Kaleidoscope" may be heard as a microcosm of the film's story arc. The music begins in an orderly fashion, just as Nash begins as a mathematician who seems sane and who can perform calculations in a lucid manner. The music breaks the pattern and descends into chaos, and in the second part of the film, Nash descends into paranoia, seeing things and patterns that do not exist. The last part of the opening cue recalls the first, though it is more thinly scored; the final part of the film has Nash overcoming his illness to do math again, but never with the flair and fervor of his youth.

But it is only *with* the images it accompanies later in the film that one can determine that Horner employs minimalist techniques here to signify the mathematical mind. In the first portion of the film, derivations of "Kaleidoscope" occur three times. The first is after Nash, played by Russell Crowe, has entered Princeton for graduate study. The reclusive, socially-inept genius skips classes to develop his theories, though his research is stymied until he is approached by his fellow students while at a bar. They notice an attractive blonde and discuss how to win her affections over a diegetic music background of big-band jazz. One student mentions Adam Smith's economic postulate: "In competition, individual ambition serves the common good." Nash disagrees, his mind churns, and the diegetic big-band music and the background dialogue fade out. Nash explains that he has a different theory, and the filmic images shift from realistic diegesis to the projection of Nash's thoughts—people and the bar blur and move in

accordance to the tenets of his new economic theorem. Accompanying the visual projection of Nash's idea is music derived from both the A motive and the sequence from "Kaleidoscope" (20:07-20:58). This music, while based on "Kaleidoscope," which employed minimalist techniques, can only be considered borderline minimalistic. It is motivic, and its motives repeat with a steady beat, but not very many times; they are also varied with each repetition. One can consider this cue as *referencing* the minimalist techniques of "Kaleidoscope."

After Nash has this flash of insight, he scurries from the bar to his room to develop his hypothesis on paper. On the screen, his calculations are displayed with a time-spanning montage that shows Nash working on graphs and equations from winter through spring. Along with the computative images, one hears Nash muttering numbers and variables. One shot shows his mouth moving as if speaking, but the echoing quality and thick layerings of the sound suggest that these numbers are instead emanations from his mind. The trance-like quality of the music reflects Nash's single-minded intensity, focused on the problem through several seasons of time. Yet another variation of "Kaleidoscope," "Creating Governing Dynamics," marks his furious thinking, a version quite similar to the original "Kaleidoscope" but now in compound meter (21:32-22:36, in 6/8 and 12/8).[9]

Music descended from "Kaleidoscope" occurs once more in the first part of the film, the last time we see Nash figuring out his own mathematical problems before it is

9 The music continues after this, but has disintegrated, with no more steady beat. Instead of being minimalist, it changes to music that more closely resembles the classical Hollywood film score; it no longer represents his mathematical mind, but his emotion on waiting for his professor to judge his work.

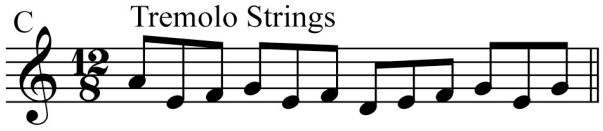
revealed he has schizophrenia. The scene begins at 24:46, when Nash has been asked to help decipher an intercepted Soviet code. While the screen shows the Pentagon and then Nash walking into a room within it, the musical score is typical of the classical Hollywood style: it is a very slow, low string melody performed in a rhythmically free manner. Its slow speed, minor mode, and instrumentation give the Pentagon visit a sense of foreboding, emphasizing the tensions of the cold war (the date displayed on screen is 1953).

But the music changes dramatically once Nash begins examining the huge strings of numerals displayed on the wall (25:34). The camera/room spins around Nash and we begin to hear Nash's voice muttering numbers, though his lips do not move. The vocalized numbers are, as in the earlier "Governing Dynamics" scene, layered over each other with an echoing quality—it is obvious that these are not spoken, but the visual projection of his thoughts. Nash concentrates intently on the code, and certain numerals appear to spring toward him. The room in the background speeds by as time passes, but Nash is oblivious to all but the code.

The music accompanying this scene, "Cracking the Russian Codes," is once again derived from "Kaleidoscope" material. Whereas for "Kaleidoscope" one could not definitively pin down the music's meaning because it was pre-diegetic, here the music, its changes, the camerawork, and the diegetic images all come together to reinforce each other and suggest meaning. "Cracking the Russian Codes" begins with eleven repetitions

of motive C (shown in Example 6.7, see Example 6.10 for entire piece).[10] This swirling, tremolo string motive accompanies the image of Nash in the Pentagon as the camera (or, to the film viewer, the room) revolves around him. To the strains of this music Nash gazes at the coded numbers, deciding where to begin to solve this problem. Motive C is repeated on D minor (as shown in Example 6.7) four times, twice on the minor pedal $\frac{6}{4}$ chord, after which it follows the (d-C-Bb-C-) cycle from "Kaleidoscope" (see Example 6.8 for this chord cycle as it occurs with motive B in "Kaleidoscope" and motive C and B' in "Cracking the Russian Codes").

Example 6.7: Beginning of "Cracking the Russian Codes," motive C



After eleven repetitions of motive C, the room stops swirling as Nash tackles the issue in earnest, staring straight at the numerals, his eyes darting to take them in as we hear his "mental voice" talking through them (25:59). Motive B'—a variant of motive B from "Kaleidoscope" but now in 9/8—takes over on piano, moving through two repetitions of the (d-C-Bb-C-) cycle first expressed by the B motive in "Kaleidoscope" (see Example 6.8). Motive B' is crisp, repetitive, and performed with exacting precision, analogous to the logical deliberations of Nash's mind as he works step-by-step to decipher the code. The tempo is approximately M.M. 120; at this speed the triplet pattern of the B' motive is incredibly fast. Numbers begin to pop out at him with flashes of white

10 This musical example is a close approximation; as the music is under dialogue and its instrumentation is tremolo strings, the pitches are difficult to pinpoint.

light.

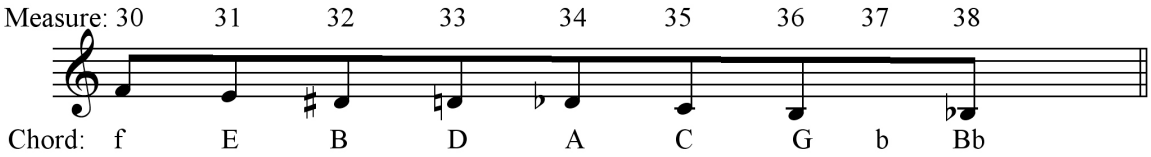
Example 6.8: The (d-C-Bb-C-) chord cycle as it appears in “Kaleidoscope” and “Cracking the Russian Codes.” The down-stemmed notes in the second stave, motive C, are not sounding pitches but represent the chord prolonged through the measure.

After two B' cycles, the piano continues its triplet figure, now on the same chord succession sequence as “Kaleidoscope” (-m2, +P5, +M3; see Example 6.10 for chart of entire structure of cue). Unlike “Kaleidoscope,” “Cracking the Russian Codes” keeps the sequential process longer. After going through two (-m2, +P5, +M3) sequences (mm. 20-25), the piano plays the motive B cycle (transposed, so now f-Eb-Db-Eb-), then returns to the (-m2, +P5, +M3) chord succession. This time, the sequence's +M3 is replaced with a +m3. Since the +m3 is a half step smaller than the +M3, the following -m2 is not necessary, so the sequence drops it for two iterations (mm. 30-36).[11] The renewal of the

11 The ascending m3 is equivalent to three half steps. An ascending M3 is four half steps, a descending m2 one half step. So the combination of the operations +M3, -m2 (+4, -1) is equivalent, and replaced by +m3 (+3).

+M3 in m. 37 brings the -m2 back to the sequence for mm. 37-38. Though the interval motion of the process might be compressed in mm. 30-36, the effect is the same as the original sequence because the music retains the descending half-step voice-leading motion so noticeable in the first version (mm. 20-25 of "Cracking the Russian Codes"). Now that half-step descending voice-leading is continuous, and in the same voice (see Example 6.9).

Example 6.9: Descending half-step voice-leading in mm. 30-38 of "Cracking the Russian Codes"[12]



With the musical accompaniment of these sequences, Nash continues working, now oblivious to all around him. While he is shown rooted to the same spot—with superhuman concentration—the other figures behind him move to several different positions, implying a long passage of time. This trance-state that occupies Nash is also an effect minimalist music is often claimed to induce; in this case, the chord sequence pattern just keeps going and going as Nash is fixated on the code. The sequential pattern of the music is reflected by the images on the screen: Nash begins to see patterns emerge from the code numbers, including a Sierpinski triangle (occurs during mm. 30-38, the second sequence).[13] The logic underpinning the scene is clear; since the minimalistic

12 Enharmonic spellings are used to clearly show the descent.

13 A Sierpinski triangle is a fractal design. If one connects the midpoints of an equilateral triangle, one gets another equilateral triangle inside it; this embedding can continue infinitely and looks the same at

process has an analogue in the image, and the image is a projection of Nash's thought process, Nash's mathematical mind is analogous to the music.

The chord succession and its embedded descending half-step voice leading then *does* break—at the exact moment Nash (26:40, m. 39) stops his calculations, having achieved an answer to the code. In addition to the sequential process breaking here for new intervals like -P5 and -M3, the meter changes to 12/8 and the most prominent instrument switches from piano to arpeggiating strings (see Example 6.10 for the entire structure of "Cracking the Russian Codes").

Example 6.10: "Cracking the Russian Codes"

Motive	motive C	motive C	motive C/B	motive B'
Chord(s)	d (4X)	minor ped$\frac{6}{4}$ (over d, 2X)	d-C-Bb-C-d	d-C-Bb-C- d-C-Bb-C
Measure(s)	1-4	5-6	7-11	12-19
Prominent Instrument	tremolo strings	tremolo strings	tremolo strings	piano

Motive	sequence	motive B'	sequence	sequence broken
Chord(s)	a-Ab-Eb-g-Gb-Db (-m2, +P5, +M3)	f-Eb-Db-Eb	f-E-B-D-A-C-G-b-Bb (-m2, +P5, +m3 +P5, +m3 +P5, +M3 -m2)	F-minor ped$\frac{6}{4}$-F-bb-Gb-Db-ab-E-B
Measure(s)	20-25	26-29	30-38	39-47
Prominent Instrument	-piano -occasional low string counterpoint	piano	-piano -voice on "ooh" as counterpoint	arpeggiating strings

any magnification.

The "Kaleidoscope"-derived variants disappear in the middle of the film. The final time minimalist music clearly derived from the opening cue occurs is near the close of the film, when the much older Nash has overcome his schizophrenia to again attempt mathematics.[14] In the sequence from 1:54:30 to 1:55:27, Nash is shown next to a blackboard covered with equations, ignoring his illusions, then riding a bicycle in infinity loops, lost in thought—muttering numbers to himself and making hand gestures suggesting intense concentration. The segment fades from his bicycle loops to a written infinity loop, part of an equation Nash has written. The "Kaleidoscope"-derived music accompanying these images is a much slower version than "Cracking the Russian Codes," a ¾ version at M.M. 80. The drastic speed reduction gives the music an autumnal tone; the adagio music marks the mind of an older Nash, which now functions at a tempo far removed than that of the allegro of his youth. But while at a slower tempo, the reprise of "Kaleidoscope" material shows his triumph over mental illness; since the music was only used earlier over Nash, in a lucid state, solving math problems, the reuse of this music here suggests a return of his ability.

6.3 *Proof*

Whereas *A Beautiful Mind* follows the life of a mentally ill mathematician, *Proof*'s story is about a mentally ill mathematician's unstable daughter (who is also a mathematician). The 2005 film, directed by John Madden, stars Gwyneth Paltrow as

14 Other cues in the film could be considered distant cousins of "Kaleidoscope," but only those discussed are close variants.

Catherine, a student who drops out of school to care for her ailing father. When her father (played by Anthony Hopkins) passes away, one of his graduate students, Hal (Jake Gyllenhaal), goes through all the late scholar's notebooks to see if there is anything of value. He finds nothing lucid until Catherine gives him the key to a desk drawer, where he discovers a notebook with a proof of a prime number theory. Catherine claims that it was she who wrote it, but Hal and Catherine's sister, Claire (played by Hope Davis) have trouble believing her, thinking instead that it must belong to her father. The film explores the emotional entanglements of Catherine, Hal, and Claire as they struggle over who wrote the proof. Through a series of flashbacks the movie also delves into Catherine's relationship with her father, his madness, and the proof. So the film's title is a double entendre, centering on not one, but two proofs: the mathematical one itself, and on how—and if—one can prove ownership of an idea in spite of inconclusive evidence.

Like Horner in *A Beautiful Mind*, the composer of *Proof*, Stephen Warbeck, uses a range of musical styles within his score: minimalism, ambient music, and more conventional cues. The opening music (0:34-2:46) is ambient, perhaps even stream-of-consciousness. It begins with marimba, adds guitar and piano, and then strings, moving from motive to new motive, with no steady, repeating pulse. Musical material might be repeated a few times, but then it moves to something new—reflecting the erratic onscreen action of Catherine flipping TV channels from infomercial to infomercial. While the opening music is ambient, other cues are conventional. After her father's funeral, Catherine is accompanied by a minor lyrical piano and lush string piece typical of the classical Hollywood film scoring style (28:19-29:12). A string, piano, and woodwind

love theme underscores the scene the morning after Catherine and Hal have slept together (41:29-42:36), its major inflection marking their happiness. Two scenes employ the same melancholy, Romantic, Chopin-like solo piano cue; one (1:14:52-1:16:08) applies it over images of Claire comforting Catherine over the loss of their father, while another (1:29:43-1:30:45) uses the piano solo over Catherine back at the university, with her narrative voice-over describing a sense of loss at having stopped practicing math, and how it seems she will have to relearn how to do it.

While Warbeck uses ambient music to set the stage for *Proof* and conventional scoring over scenes of love and loss, he uses music that employs minimalist techniques as a leitmotif for the proof itself, setting it and its creator apart as exceptional. Warbeck's "proof leitmotif" music, with its crisp, precisely played repetitions over a steady beat, sounds logical and orderly, just as a mathematician's proof must rationally work step-by-step through a problem.[15] But minimalism's use in *Proof* is more complex than in *A Beautiful Mind*. Warbeck uses the same minimalist piece, with variations, as a symbol for the mathematical genius's cogitations to discover the proof. In *A Beautiful Mind*, it was clear who was in possession of the intangible quality of mathematical genius; after the original "floating" signification of the pre-diegetic "Kaleidoscope," its variants were firmly anchored to images of Nash doing problems. In *Proof*, it is unclear who wrote the prime number proof, and the placement of the music with images of both Catherine and her father reflects this ambiguity. This minimalist music is not, as it was in Horner's score, simply linked to the image of the genius him/herself. In the manner of a

15 The leitmotif's instrumentation, with its repeating marimba motive, recalls Reich.

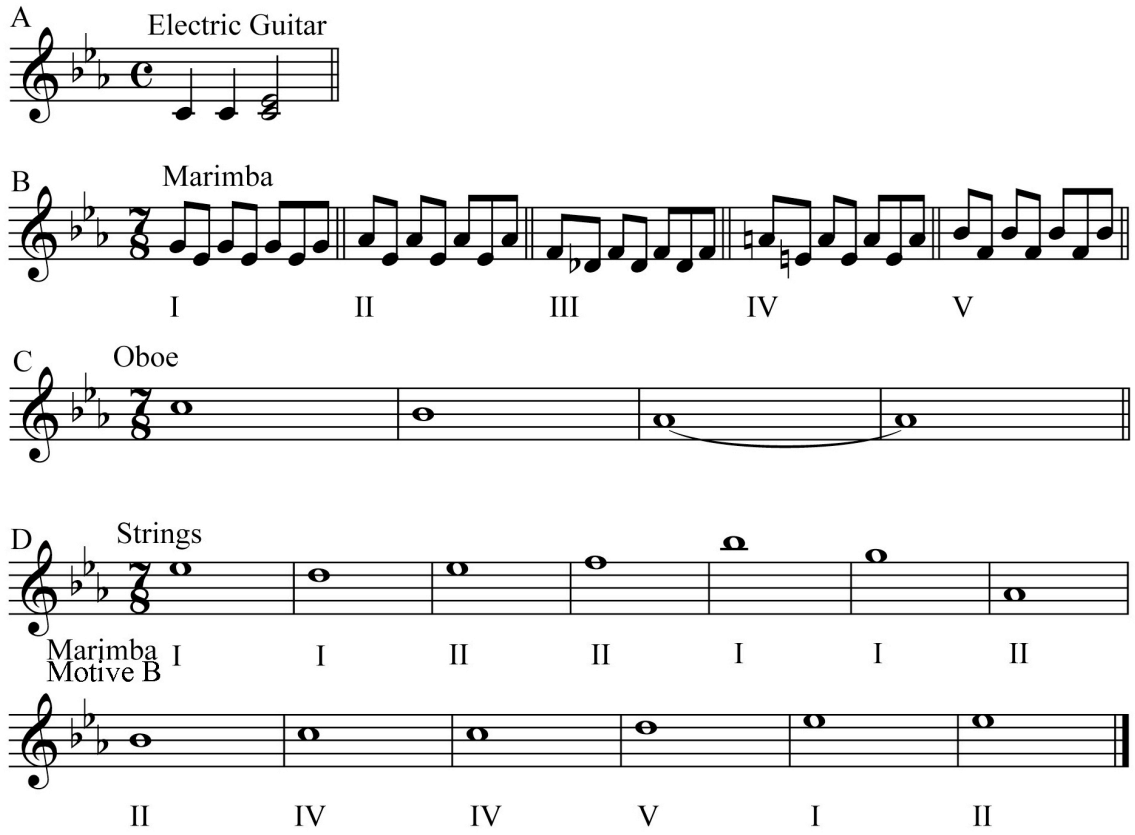
Wagnerian leitmotif, the music is also deployed over scenes under the influence of the proof: it accompanies images of Hal, Claire, and other mathematicians as they grapple with its authorship and viability.[16]

The first incidence of the "proof leitmotif" occurs at 48:16-49:56, with the initial appearance of the notebook containing the proof (see Example 6.11 and 6.12 for the musical motifs and their order). Hal brings the notebook down from where it was stored in a desk, and Claire asks who discovered it. Catherine claims that she didn't find it, but wrote it herself. While the music does not at this time accompany the actual writing of the proof, its appearance in the score with the initial viewing of the physical manifestation of the proof (the notebook) connects the two. The camerawork here also ties the leitmotif to Catherine. While the music begins at 48:16 with electric guitar (Example 6.11, motive A), the distinctively minimalist part of the work, the repeating eighth-note marimba motive B, does not begin until 48:29, when the camera moves to an approximately 20-second ever-tightening closeup of Catherine's face. During this closeup, it is Hal who is speaking, but the camera ignores him. The focus is on Catherine, with a pensive "thinking" expression on her face; she looks as if in a trance, thinking about the proof and her past. The music, repetitively alternating between motive B's figures I and II, reflects this with a hypnotic sensibility. This connection of Catherine's head—the close-up—with the marimba motive ties her mathematical logic with the precise repetition of the music. Catherine is jolted out of her reverie when both Hal and Claire say "Catherine"; this startling out of hypnosis is marked musically with a

16 Gorbman, *Unheard Melodies*, 28.

new pitch level for the marimba motive (BIII at 48:44), which includes a b2—a surprising intrusion into what has been comfortably diatonic in C minor.

Example 6.11: Primary "proof leitmotif" motives (48:16-49:56)[17]



Example 6.12: Order of "proof leitmotif" motives (48:16-49:56)

48:16-	48:29-	48:36-	48:44-	48:47-	49:00-	49:23-
Motive A about 8X	BI 2X, BII 2X	C on top of BI 2X BII 2X	BIII 2X	B I 2X, BII 2X, mix of BI/BII, BII 2X	D accomp. by B motives as noted	Alternate BI 2X, BII 2X until fade out

17 There are some wind interjections as well during D; they play a version of motive B.

After Catherine says, “I wrote it,” the focal point of the music turns to the strings' motive D, a quasi-melodic line. This more melodic section swells to give emotional emphasis to her words, and then accompanies a scene and time change—there is a cut to the past and Catherine's university.[18] The music changes back to pure minimalist at 49:23, alternating between BI and BII as it continues over a flashback of Catherine visiting her mathematics professor. The continued minimalist techniques over images of Catherine further link this music with her mathematical gift.

A variant of the “proof leitmotif”—played with strings, then piano on motive B—occurs when, in another flashback, Catherine's father hands her a notebook that he says has a rough outline of a proof (1:00:30-1:01:44). Is the proof his, and in this notebook? Returning to the present, Claire and Hal argue again that it might be her father's, not Catherine's, mental “machinery” that produced it. The music, tying the leitmotif to Catherine's father handing her a notebook with equations in it, seems to imply that this might be the case; the proof might be his.

But the next occurrence of the proof leitmotif suggests the opposite. From 1:08:46-1:09:37 (again with variation, especially the introduction and ending), the leitmotif plays over images of Hal and his friends examining the proof and a flashback of Catherine actually writing a proof. Since she is shown here studying and writing mathematics accompanied by the leitmotif, perhaps the proof does belong to her. A similar scene occurs 1:10:45-1:11:41, but now with flashbacks of *both* Catherine and her

18 There is another jolt out of C minor during this melodic section—motive BIV's raised 3 and 6—but this inflection does not mark anything; it occurs within the dialogue-less scene and time change.

father working as if in an analytical trance intercut with images of Hal's professors scrutinizing the proof. The music is even more varied here, with a lyrical string line superimposed on top of the minimalistic background lending a sense of excitement and anticipation as both Catherine and her father near a breakthrough. As she finishes her proof and brings it to her father to show it—and, in the present day, all the professors confirm that the mathematics works—the music returns in a guise nearly identical to its first appearance (48:16), with thicker orchestration telegraphing a climax (1:12:05-1:13:35).

After the music fades out, Catherine's father holds out his notebook and says, "I think I've got it." Is the proof in his notebook, or hers, the one Catherine brought to show him? The proof leitmotif does not say, but at 1:25:46 music more typical of the classical Hollywood scoring style does. Her father forces Catherine to read his work aloud, and from this reading it is obvious that he has relapsed into insanity. The music that accompanies this revelation is somber, melancholy, lyrical strings—the different musical style over the reading of his theory shows that it is not he who is responsible for the prime number proof.

The final incidence of the "proof leitmotif" is at the end of the film, when Catherine goes over the proof "line by line" with Hal to show that, while she cannot prove that she did it, she can show that she could have done it (1:32:59-1:35:32). She opens the notebook, and they begin to discuss the logic. The musical variation that accompanies this scene regains the instrumentation of the proof leitmotif's first occurrence, with electric guitar and marimba. The repetition of the leitmotif here at the

close, in such a similar fashion as to its first appearance, gives credence to her assertion that it was she who created the proof. What is different in this last variation is that the marimba alternation between BI and BII continues for more than a minute; the strings do not overtake it until 1:34:10. This long, hypnotic alteration between BI and II marks the trance state of Catherine and Hal as they discuss the proof. When the strings eventually do come in, they gradually morph into lyrical material that overlays the minimalist background. The melodic nature of the strings, outside of typical minimalist technique, allows the music to do what minimalist techniques struggle with: portray emotion. The predominantly upward-reaching, major chord-supported melody marks with happy triumph Catherine's return to mathematics and her reconciliation with Hal. But this triumph is tempered with melancholy—a melancholy reflected by the melody's frequent half-step motions and its occasional switch to minor accompaniment—Catherine must work to regain lost time, while Hal, in her words, has "got a bit of ground to make up" both with her and the proof's math. While its minor inflections make the close bittersweet, the continuation of the minimalist motive through the scene and into the end credits suggests that her mathematical genius, like the music, will persevere.

CHAPTER SEVEN
MINIMALISM AND DYSTOPIA

7.1 Introduction

In addition to its use as a signifier of different types of Otherness—machine, alien, and cultural—as well as the mathematical mind, minimalism has also been employed as a marker of dystopia. Such a use should not be too surprising; dystopian fiction is a common sub-genre of science-fiction, and sci-fi and horror films have often served as a locus for the use of non-traditional film music. As these films portray the otherworldly, the directors of these genres have found it apt to utilize sounds—such as dissonant and electronic musics—which aurally support such alterity.[1] Friendly to musics outside the classical Hollywood film score style, it makes sense that these genres would be swift to embrace other musical techniques that might support their filmic ends.

Chapter Three has already analyzed several films that would fit just as well with the idea of dystopia as they do with Otherness. Both *The Terminator* and *A.I.* detail dystopian post-apocalyptic worlds where some humans have been replaced with machines. *The Terminator*'s music and the beginning of *A.I.*'s "Hide and Seek," which show the robots as mechanical, emotionless Other, could easily be read as the dystopian result of humans playing god, making machines in their own image.

But the idea of dystopia is not limited to science-fiction films. Even *Koyaanisqatsi*, in "The Grid," portrays a dystopian image: humans being dehumanized

1 Hayward, "Sci Fidelity—Music, Sound, and Genre History," 24-25.

because of the alienation of the modern industrialized world. Cognizant that the idea of dystopia is not then limited to the genre of science-fiction, this chapter will examine how minimalist techniques signify the idea of dystopia in both the sci-fi and another genre, the documentary. The choice of including a documentary might seem unusual, as dystopias are customarily fictional, taking some present-day idea (like genetic modification for *Gattaca*) and exaggerating it to show its potentially negative effects. But there are a number of reasons for this approach for this particular film, *The Thin Blue Line*: it does not purport to present objective "truth," but subjective "truths;" as such, some of the stories it tells are imaginary. The narrative presented by the documentary, like dystopian fiction, reveals the negative effects of present-day problems; these issues, however, are not potentially harmful in some speculative future, but, more disturbingly, have already occurred.

7.2 Minimalism and Entrapment

7.2.1 *The Truman Show*

One of the science-fiction films which employs minimalist techniques as a marker of dystopia is *The Truman Show* (1998). But before detailing how it may serve this function, it is instructive to contrast *The Truman Show* with another film, released the same year, in which music is initially used to reinforce a utopia: *Pleasantville*. These two movies share a premise: protagonist(s) are trapped in a television show that is presented as a utopia, but from which they desire to escape. Film critics have noted their similarities; both are satires of the media and hinge on the theme of human freedom. But

while critics noted their analogous narratives, the role of music went unmentioned. Both movies employ scores featuring a variety of musical styles and multiple composers. But the two films diverge in the way they treat their similar underlying themes—a schism reflected by differences in their use of music.

In *Pleasantville* (1998), directed by Gary Ross, two teenage siblings named David (Tobey Maguire) and Jennifer (Reese Witherspoon) are sent by a mysterious television repairman (Don Knotts) into a black-and-white TV sitcom called "Pleasantville."[2] *Pleasantville* presents an impossibly idealized town, a nostalgic vision of 1950s Americana; all the neighbors know each other and the basketball team always wins. The mother is a housewife who has dinner on the table when the father comes home, no one knows about sex, and there is no such thing as fire—the firefighters don't even know what fire is, their purpose is simply to rescue errant cats. No one has ever been outside this insular town, as the two roads, Main and Elm, simply loop back on themselves. There is no outside knowledge at all: the books are simply bound sheets of blank paper. But this utopia, though pleasant, is simply impossible; it is not a mirror of the 1950s, but instead reflects a nostalgia for what the 1950s were imagined to be, but never were. The siblings are thrust into this innocent Garden of Eden and immediately want to escape. They see the mysterious repairman on their 1950s TV set and demand to be taken home. He refuses, and the teenagers are forced to figure out how to live in this utopian world as the characters "Bud Parker" and "Mary-Sue".

2 As the films and the television shows within them share a title, I will distinguish the two by putting the movie titles in italics and the television show titles in quotation marks. Pleasantville is also the name of the town in the film; as a place name it will have neither italics nor quotes.

The score of *Pleasantville* initially reinforces its utopian vision. When the firefighters rush to rescue a cat stuck in a tree, Copland-esque music, brassy and wholesome, accompanies their heroic efforts (19:21). More Americana, a Sousa-like, major-key military march, plays non-diegetically while the children walk into school under a proudly-waving American flag (21:15). This same march accompanies the basketball practice of the high school all-American boys, with every one of their shots going straight through the basket (22:52).

David/Bud and Jennifer/Mary-Sue know they cannot escape without help, so they do not attempt it; instead, their influence, spread to the innocents, begins to remake the impossibly utopian world. They serve as a tree of knowledge. Pleasantville begins to change; high-school students and repressed 1950s housewives learn about sex, the soda-fountain owner explores his gift of painting, the books at the library are filled with text. As the town evolves, it and the townspeople gradually turn from black and white to color. The town is connected to the outside world as its roads link up with exterior ones. Not all these changes are pleasant ones—the "colorization" of some people leads to prejudice and violence. But the change is necessary. The nostalgic 1950s utopia was not fully "real," it never existed with real human beings having free will. With free will, some of the changes are good, but one has to take them with the bad. Learning this lesson, both David and Jennifer change, too.

The music—like the change from black and white to color—underscores the dramatic evolution of the town. The next basketball practice is again accompanied by the Americana march, but the team captain, Skip, has now been affected by Mary-Sue. He

takes a shot, and for the first time in Pleasantville's history, misses. The Americana march stops with the missed shot, dramatically marking the beginning of the change in the town, and Skip, from idealized utopia to reality (37:46). Where harmless, wholesome Pat Boone 1950s rock and roll played in the soda-shop jukebox before, now it plays soul music and late-1950s jazz charts like "Take Five" and "So What" to a crowd of young men dressed as greasers. Sexualized rock and roll like Elvis's "(Let Me Be Your) Teddy Bear" creeps onto the soundtrack. Just as jazz and Elvis were symbols of rebellion and sex in the 1950s, they serve the same purpose here.

So in *Pleasantville*, the protagonists serve as agents of change, helping remake a nostalgic idealized utopia. *Pleasantville*'s score tracks its transformation from All-American utopia to modern town, changing from "wholesome" to more charged and sexualized as the town changes in the same way. But the music serves a wholly different function in *The Truman Show*, as the utopia is not simply an impossibly idealized nostalgic image of the past, but a fake utopia, a *dys*topia where everything is manipulated and controlled.

In *The Truman Show*, directed by Peter Weir, the protagonist Truman Burbank (Jim Carrey) is unwittingly stuck inside a reality-television show created by a megalomanical producer, Christof (Ed Harris). From birth, he has been recorded every minute of his life for a TV show called (like the film) "The Truman Show." The documentary-soap is set on the idyllic island city of Seahaven, a perfectly manicured town whose local newspaper declares has been voted "planet's top town." Seahaven is presented as a utopia: there is no trash or gum on the sidewalks, the neighbors are

friendly, everyone is immaculately dressed and coiffed, and the sunsets are stunningly beautiful. Unbeknownst to Truman, the idealized Seahaven is actually inside the largest soundstage on the planet. And it is not really a utopia; instead, it is almost perfectly regulated by the dictatorial Christof. He is set up as a god-like figure (note his name), with control over the weather and even the sun and moon.[3] Through the earpieces worn by all the people in Seahaven except Truman, he dictates their actions and sometimes even their words; they are actors, playing roles, Truman—the "true-man"—is the only one who is unscripted. Christof does not have direct control over Truman's actions, but manipulates his life through what he makes happen to him. For instance, he keeps the curious Truman bound to the dystopian Seahaven by conditioning him to fear water. Christof designed what he calls an "episode" when Truman was eight; the boy's "father" "drowned" before the child's eyes during a storm while they were out on a sailboat.

Truman has no inkling that his life has been scripted and filmed, that everyone else in the city is actually an actor, until one day a light fixture, the kind used to light TV shows, falls from the sky. A combination of other glitches—an elevator that has no back, his car radio tuning to the frequency used by the actors' earpieces (the station's talk follows every move of his car), people he has never met knowing his name, his "dead" father appearing as a homeless man and being rushed away by a crowd of people—gradually make him aware that something is amiss in the sleepy town of Seahaven. Christof attempts to explain away or normalize these mistakes: the radio reports that an airplane dropped parts (the light fixture), and Truman's wife Meryl describes a horrific

3 In one of the great lines of the film, Christof says, "Cue the sun."

elevator accident that led to an amputation surgery (thus the no-backed elevator). Truman's "dead" father reappearing is explained away, in true soap fashion, as amnesia.

But Truman becomes increasingly suspicious, and longs to escape the town and to go to Fiji to see a girl he fell in love with in college, Sylvia (or Lauren). At first his desire to get away is expressed simply to his friend Marlon, in one of those wistful "someday I'll" speeches that reflects a desire that for now only remains a fantasy. But as Truman becomes more and more paranoid—for good reason—he begins to act in increasingly desperate fashion on that dream. Each of these escape attempts is countered by Christof, who wishes to keep his reality star trapped in this dystopia.

Before explaining how the music of *The Truman Show* works to reinforce this dystopia, I will untangle the different types of music used and how they function on different strata. The music of *The Truman Show* works on several different levels, because the film itself works at several levels of diegesis. First, there is Truman's world; second, there is the world of the television studio and its audience, who watch Truman's life; third, there is the film's audience, who watch both Truman's life and the world of the TV studio and its audience. Truman's world features diegetic music that includes songs coming from Truman's car radio and rock music at a dance (20:33). But Truman's life is being filmed as a television show, and the producer of that show puts music over images of Truman's life. The music placed over the television show is nondiegetic to Truman's life (he cannot hear it), but at the same time, the music is diegetic because it is part of the level of the television studio—occasionally, we even see the performers of that music playing in the studio. Following Gorbman, I will call this music meta-diegetic because it

employs a secondary narrator—not the narrator of the film, but the narrator of the TV show.[4] While this music is diegetic to those working in the television studio headquarters, it is non-diegetic to those watching "The Truman Show" on their televisions.

Example 7.1: Story Levels and Diegetic/Nondiegetic Interpretation of Sound Sources in *The Truman Show*

Sound Source →	Truman's Radio	TV DJ/Performer	Film Score
Story Levels ↓			
Truman's World	diegetic[5]	nondiegetic	nondiegetic
TV Studio Headquarters	diegetic	diegetic	nondiegetic
TV Show's Audience	diegetic	nondiegetic	nondiegetic
Film's Audience	diegetic	meta-diegetic	meta-nondiegetic

But there is a third level: that of the music of the film, played over both levels of narrative. I will term this music meta-nondiegetic; it transcends both the level of Truman's life and that of the television show. Example 7.1 shows these different levels of the film ("Story Levels") and how different sound sources (such as Truman's radio) may be interpreted by each level.

Further complicating this diegetic/nondiegetic/meta-diegetic/meta-nondiegetic conundrum is that it is often unclear at which level the music is functioning. As director

4 Gorbman, *Unheard Melodies*, 22.

5 There is one unusual case—when Truman's radio tunes to the actors' frequency, it could be considered an intrusion into Truman's diegetic world of what should be nondiegetic to him. It is these "nondiegetic" diegetic intrusions which make Truman aware of his manipulated state, just as the "diegeticizing" —the normalizing as diegetic of what the filmic audience originally takes to be diegetic—of "Reunion" make us aware that Christof is using music to manipulate his audience, and, by extension, us.

Peter Weir says, “The use of music in this film is as unusual as the concept of the movie itself. Sometimes the music is Christof's choice, sometimes it's mine!”[6] Occasionally we (the film audience) actually see a performer in the TV studio, clearly making the music meta-diegetic. But when we do not see a performer, is the music functioning meta-diegetically, over the television show, or is it functioning meta-nondiegetically, over the entire film, encompassing both the TV show and the TV studio headquarters? But does the difference even matter? The music chosen by the producer of the television show affects both his TV audience and the film's audience. On the other hand, the difference could have implications for the film's meaning, bifurcating it. Music chosen by the TV show's producer reflects his subconscious, his view of Truman's life, and how he thinks his audience should be manipulated. Music at a meta-nondiegetic level comments on Truman's life, the TV show and studio, and how the entire film should be interpreted. The genius of the film—and the music—is that it can be taken both ways, simultaneously.

The score of T*he Truman Show* is composed of numerous musical styles, some existing works, some written specifically for the film: classical pieces, emotional cues typical of the classical Hollywood film score, and minimalist works. The score also features several composers: Mozart and Chopin amongst the classical ones, Burkhard Dallwitz as the primary original score composer, and Philip Glass for some pre-existing works and several newly composed cues. According to director Peter Weir:

> When making a film, I play music constantly during "dailies" — the nightly screenings of the previous day's shooting. I test all kinds of music

6 Peter Weir, Liner Notes, Burkhard Dallwitz and Philip Glass, *The Truman Show: Music from the Motion Picture*, Milan Records 35850-2.

> against the image, searching for the elusive "sound" of the picture. In the case of *The Truman Show*, since it is the story of a live television program, I was also determining the music that the show's creator, Christof, would have chosen … Due to the round-the-clock nature of the show, I determined that Christof would play either pre-recorded music (as a DJ might do) or, if events called for it, improvise with one of the musicians who work in several shifts.[7]

So for the music of the television show, there is both "live" and "canned" music; there is music improvised at the spur of the moment to go with the images on screen, and there are pre-existing pieces placed with the images simply for a musical background, whether or not the compositions suit what is occurring or are anempathetic. And none of these types of music, unlike those of *Pleasantville*, serve to bring out the utopian nature of Seahaven, but rather reveal it as a dystopia. The classical cues of the film seem to function as "canned" music for the television show. For example, the same Mozart piece, the famous "Alla Turca" movement of the *Piano Sonata No. 11 in A Major* (K. 331), accompanies the morning scenes of "The Truman Show." It first occurs diegetic to Truman's world, as a song on his car radio as he drives to work (4:08), but then continues in a meta-diegetic fashion as Truman grabs a paper at the newsstand. The Mozart recurs meta-diegetically at 14:26 and 1:11:25, both daybreak scenes. This particular cue, being a classical piece which could be held up as an exemplar of perfection, balance, and utopia, instead seems banal, a crass commercialization—like the use of the *Hallelujah Chorus* over Manwich commercials. As *Film Score Monthly* critic Doug Adams notes, "This music totally ignores Truman's thoughts by scoring the supposedly disposable

7 Peter Weir, Liner Notes, Burkhard Dallwitz and Philip Glass, *The Truman Show: Music from the Motion Picture*, Milan Records 35850-2.

nature of mass entertainment. It has no bearing on the scenes it's in, it's just soothing upper-class wallpaper which refuses to acknowledge Truman's humanity."[8] In other words, it is anempathetic, indifferent to Truman and his internally agitated state.[9]

In addition to the classical "canned" music, there are also cues improvised by performers in the television studio headquarters. Perhaps the most striking example of these cues is when Truman is reunited with his father after he has returned from "death" and "amnesia" (58:43-1:01:03). Burkhard Dallwitz's cue for this scene, *Reunion,* is an emotional one, in the style of the classical Hollywood film score. It begins with slow, low strings playing a descending half-step motive, a typical lamento motive used for pathos, as Truman walks toward his father. The music swells a bit and the motive is taken over by piano, accompanied by strings on a countermelody. The piano switches to a more melodic pattern (with a descending half step still embedded in it) as Truman and his father begin to speak. This scene, however, is not just about what is happening in Truman's world, but is intercut with shots of the television studio headquarters. Christof has been using Truman's friend Marlon's earpiece to feed him emotionally stirring lines, has called for fog to make Truman's father's arrival more dramatic, and has been cuing different cameras to get the best, most audience-manipulative views of the happy reunion. But Christof is not simply using fog and different camera angles to control the scene, making it more poignant—he says "fade up music," and we see a shot of a performer in

8 Doug Adams, "The Three Legs of Truman," *Film Score Monthly* Online, 11 June 1998, http://www.filmscoremonthly.com/articles/1998/11_Jun---The_Three_Legs_of_Truman.asp (accessed 20 Sept 2007).

9 Gorbman, *Unheard Melodies*, 24.

the studio, playing the keyboard.[10] What could have been interpreted as nondiegetic is now anchored as metadiegetic; Cristof is using *music* to manipulate the emotions of his television audience—and it is not simply his audience who has been manipulated, but the filmic audience as well. The strings swell, and the piano continues its melody, now louder, and on a melancholic mix of major and minor intended to pull the heartstrings. But now the illusion has been shattered—the music rendered "audible"—in a scathing satire of the media's typical emotional use of the classical Hollywood film score.[11] The music is no longer a celebration or reflection of real emotion, but a sensationalization of emotionalism.

But there is a third kind of music in *The Truman Show* besides classical music and Romantic classical Hollywood film score cues: minimalism. When writing about the film's score, director Peter Weir said, "I was also determining the music that the show's creator, Christof, would have chosen. The tracks that seemed to be drawing the most out of the images for me (and presumably Christof) were those of Philip Glass." So Weir used several preexisting Glass works, but also asked Glass to compose a few new works for the film. But not only the Glass cues are minimalist; some tracks by Dallwitz also employ minimalist techniques. But why would Weir choose minimalism? What did the tracks bring out of the images for him and Christof, and what does that reveal about Weir, Christof, Truman, and minimalist techniques?

To decipher why Weir/Christof might employ minimalism, let us first examine the

10 This is not the only scene where we see a performer in the studio. At 1:08:37 we see a greenscreen view of Truman while he rests, accompanied by a Glass cue called "Truman Sleeps." In a witty self-reflexive postmodern joke, this cue is performed live by Philip Glass himself in a cameo role.

11 Gorbman, *Unheard Melodies*, 76-9.

scenes in which minimalist techniques occur. The first incidence of minimalism takes place when Truman gives his wistful speech to Marlon about wanting to leave his job and the island to go to Fiji. This dream appears to be a simple fantasy: Marlon asks when he'll go, and Truman gives a list of reasons why he cannot. The scene is accompanied by a newly composed minimalist Glass cue, called "Dreaming of Fiji," whose melody will reappear later in the film (9:36-11:25). Minimalism enters the score a second time after Truman's radio picks up the actors' frequency. Suspicions raised, Truman leaves his car and walks slowly to his jobsite, for once breaking his routine by not getting a paper at the newsstand. He steps into his building's revolving door, rotates through it twice, and steps back outside, escaping his job to sit at a table at an outdoor cafe (30:39-32:24). The minimalist cue restarts after a bus stops right in front of Truman—missing him by inches—and Truman runs to Marlon to express his suspicions (33:01-34:38). Both these sequences are underscored with a segment of Glass's "Anthem," taken from the film *Powaqqatsi.* Minimalist techniques are on display again with a drum-loop percussion piece—a segment from "The Beginning," from Glass's *Anima Mundi*—when Truman follows Meryl to work, suspecting her, and relays a message to his wife through a nurse that he's going to Fiji (40:13-41:57, third).

The fourth occurrence of music featuring minimalist techniques is not a piece by Glass, but a cue by Burkhard Dallwitz, "Drive." This percussive cue accompanies Truman's attempt to escape the island in his car, Meryl in tow (47:44-48:46, 49:25-49:57, 50:17-51:11). His escape is finally thwarted by a fake nuclear reactor leak; police have cordoned off the road and are evacuating the area. After one of the policeman makes a

slip and calls Truman by name, again raising his suspicions, and he jumps out of the car and tries to escape on foot, only to be caught by men in radioactivity-protection suits. This woodland flight is scored with another Dallwitz piece, "Underground," a brisk minimalist work with percussion loop, repeating synthesizer motive, and string pad (52:03-52:34, fifth).

Music employing minimalist techniques is used on the soundtrack a sixth time when Truman discusses his growing paranoia with his friend, Marlon, saying, "Everybody seems to be in on it." Marlon, fed words in his earpiece by Christof, tries to convince Truman otherwise; Christof abuses the two's friendship by making Marlon tell Truman that if there is a conspiracy, he must be in on it. A pre-existing Glass track is used over this manipulation, "Living Waters" from the film *Anima Mundi* (55:20-58:35). A new, soothing Glass piano solo, "Truman Sleeps," is performed meta-diegetically by Philip Glass at the show's headquarters over a green-screen image of Truman sleeping; Christof and Sylvia/Lauren touch Truman's face in the only way they can, on the screen (1:08:36-1:10:07, seventh). Philip Glass's music is used once again when Truman has escaped his house; "Anthem," a work employed earlier in *The Truman Show*, is reused when the actors and Christof try to find Truman (1:18:12-1:21:21, eighth minimalist cue).

The close of the film features several minimalist works in quick succession. Truman has overcome his fear of water to escape Seahaven aboard a sailboat; to stop him, Christof calls up a storm using his weather program. A close variant of the piece that underlined Truman's flight from the fake nuclear leak, "Underground/Storm," accompanies his struggle against the deluge (1:23:38-1:24:40, 1:25:04-1:25:58, ninth).

After the storm has broken, Truman sails into blue skies, underscored with Glass's new work “Raising the Sail,” which has similar melodic material to “Dreaming of Fiji” (1:27:38-1:29:25, tenth). The piece screeches to an abrupt halt when Truman's ship runs into the studio wall. Christof, in a god-like voice, tries to convince Truman to stay in the world he has created for him; the scene's religious overtones are underscored by a hymn-like pre-existing minimalist piece composed by Wojciech Kilar, “Father Kolbe's Preaching” (1:30:05-1:34:39, eleventh). Rejecting Christof, Truman decides to leave, walking through a door in the studio wall. His final escape—and the television audience's reaction to his triumph—is marked with Glass's cue called “Opening” (from *Mishima*) that, after a short non-minimalist introduction of tremolo strings and ascending chromatic lines (1:34:51-1:35:13), features arpeggios on brass and synthesizer (1:35:13-1:35:45, twelfth). The end credits then begin with a reiteration of Dallwitz's minimalist “Underground” (1:35:55, thirteenth).

After examining the context of the thirteen cues employing minimalist techniques, it is evident that the majority of them—at least ten—are tied to images of Truman either talking about or attempting to escape (1, 2, 4, 5, 8, 9, 10-13). Two of the other cues, though not directly about his escape attempts or thoughts, can be tied to escape obliquely. Cue three, where Truman follows his wife to the hospital to check out his paranoid suspicions, he tells a nurse to relay to Meryl that he's going to Fiji. Cue six, “Living Waters,” when he talks to Marlon about his paranoia, is not directly about escape; instead, Truman discusses one of the reasons he wishes to escape—because he thinks there is

some vast conspiracy.[12] So the director of *The Truman Show*, or the producer of "The Truman Show," has chosen to underscore "escape" with minimalist music. To understand what it is about these tracks that has drawn "the most out of the images for me [Peter Weir] (and presumably Christof)," I will discuss two sequences in detail, examining both their music and filmic imagery.

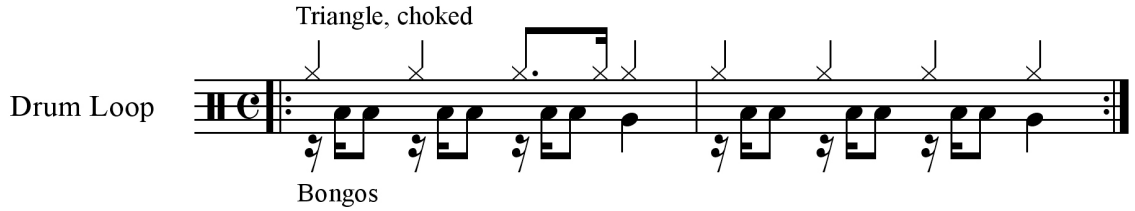
By forty-six minutes into the film, Truman has attempted to escape Seahaven by both plane and bus, but his efforts have been rebuffed. The travel agent told him that there are no flights to Fiji for a month, while the bus driver intentionally stalled out his vehicle. Frustrated, Truman has been sitting in his driveway in his Ford Taurus, ruminating and noticing yet another curious occurrence that fuels his paranoid suspicions. When his wife joins him in the vehicle, he predicts the future: pointing to the rearview mirror, he says there will be a woman on a bike, a man holding flowers, and then a dented Beetle. After these events occur just as he foretold, Truman tells his wife: "They're on a loop. They go around the block, they come back, they go around again. They just go round and round. . . round and round. . ." Spurred once again to escape the island by these uncanny events, Truman locks Meryl in the car and drives away.

This wild ride is accompanied by Dallwitz's percussive cue, "Drive," which occurs in three segments. In its first appearance (47:44-48:46), it has a few measures of introduction (47:44-47:52), and as Truman begins to drive the music settles into its minimalist groove at approximately M.M. 104. The cue obviously employs minimalist

12 There *is* some vast conspiracy. The only cue that cannot be easily tied to Truman's escape thoughts/attempts is "Truman Sleeps." Sleep is perhaps the only place in Seahaven where Truman has true freedom—Christof cannot watch or manipulate Truman's dreams. But Christof can—and does—touch him, even if only his image. This is not only a sign of affection, but one of power.

techniques: it is composed of a two-bar repeating drum loop with a steady pulse, shown in Example 7.2, and repeating non-melodic, diatonic, low string motives, shown in Example 7.3. The same affect is sustained throughout, and the work limits its harmonic palette to only two chords. In the first appearance of "Drive," the drum and string motives occur as shown in Example 7.4. In addition to these cyclically repeating modules, a varying rock electric guitar riff is placed on top of this minimalist cue in mm. 13, 15, and 21 (marked as "E.G. Riff" in Example 7.4).

Example 7.2: Drum loop in "Drive," *The Truman Show*



Example 7.3: String motives in "Drive," *The Truman Show*

Example 7.4: Order of motives in "Drive"

Measures	1	2	3	4	5	6	7	8
Drum Loop----------								
String Motives			A		A'		A	

Measures	9	10	11	12	13	14	15	16
Drum Loop----------								
String Motives	A'		B	B'	A'		A	
E.G. Riff					X		X	

Measures	17	18	19	20	21	22	23	24
Drum Loop----------								
String Motives	A'		B	B'	A		A	
E.G.Riff					X			

For the majority of the first occurrence of this cue (48:01-48:39, or 39/54 seconds), Truman is speeding his car around a traffic circle; this revolution is shown both through medium-closeups of Truman, medium shots of the car interior, and a long overhead boom shot of the car revolving around the roundabout. The music pauses as well as a minimalist piece can, with an extra drum thump on beat four of a measure after a repetition of one of the string motives on the composition's tonic, Ab. The music stops when Truman's car does—having left the traffic circle, his car is brought to a standstill by a sudden traffic jam at a stop sign, presumably caused by Christof in a bid to prevent his escape. Truman puts the car in reverse, and the music resumes when he returns to the traffic circle, driving round and round, laughing hysterically (49:25-49:57). He makes it back to the stop sign, and this time there is mysteriously no traffic. The music ceases yet again to be replaced by a low, tonic Ab drone when Truman is halted by his aquaphobia at the bridge out of Seahaven. Truman tricks Meryl into taking the wheel, and the music begins again (50:17-51:11). This time, his desperation is foregrounded by high-pitched electric guitar "screams" above the minimalist loop, four-measure long piercing tones on Ab4 and Cb4. "Drive" continues as Truman ignores a "Forest Fire Warning: Extreme Danger" sign, even plowing his Taurus through a fake forest fire Christof has presumably caused. The music fades out as the scene changes, to Meryl and Truman discussing how

their trip should work. In a few seconds, Truman's escape attempt will be stymied anew, this time by a sham radiation leak accompanied by yet another minimalist cue.

On a low level, the music over this escape attempt could be read as tension music, perhaps as musically emphasizing the pounding heartbeat of Truman as his adrenaline soars. The music does have a continuous steady pulse at M.M. 104, which could be seen as iconic of the body's pulse. Given that the average resting heart rate is 60-80 beats a minute, the M.M. 104 tempo would signify a person under stress.[13] Not only may the fast, steady pulse portray Truman's distress, but the music could also be intended to have the same physiological impact on the viewer, raising his/her pulse. Fast tempo has often been a trope of excitement in film scores because of this physiological effect; Christof/Weir could be exploiting this oft-used effect to again manipulate the emotions of their audience.[14] Several of the other minimalist cues share in this fast speed ("Underground," "Anthem," "Undergound/Storm"), and the tempo of the various minimalist cues does seem related to the desperation of Truman's various escape attempts. "Dreaming of Fiji" and "Raising the Sail" are employed in less stressful scenes, and have correspondingly slower tempos.

But this explanation seems superficial. It seems valid to suggest that the music's kineticism could reflect Truman's excitement, and that it could also be employed to bring about the same effect in a viewer; however, any type of music could be used to this effect. Out of all possible choices, why would Weir choose minimalism to place over these

13 "Resting Heart Rate," American Heart Association, http://www.americanheart.org/presenter.jhtml?identifier=4701 (accessed 12 Sept 2007).
14 Kalinak, *Settling the Score*, 9-11.

scenes? When one thinks of escape, one imagines someone (like Truman) trying to break out of something known into something new or different. Minimalism tends, on the other hand, to repeat the same motives obsessively. Its change rate is very slow, rarely changing drastically into some new texture, harmony, or instrumentation. It seems counterintuitive to associate music featuring no or slow change with a concept—escape—that is about change; the ideas are not homologous. Realizing the dissonance of these concepts, perhaps Weir did not intend for minimalism to signify escape, but rather Truman's impotence to escape. From this perspective, minimalism underlines Christof's entrapment and control of Truman's life.

The theme of control and entrapment is often expressed in *The Truman Show*. Truman, who longs for adventure and freedom, is stuck in a sham utopia where nothing really changes; everything is managed with totalitarian finesse—the weather, perfectly manicured hedges, even the people around him, who are fed lines by Christof in their earpieces. The producer claims that Truman is real and unscripted; however, the latter is constrained by the forces around him into a particular cyclical role. He leaves the house every morning, is always attacked by Pluto, a neighbor's dog, and always greets a neighboring family with a syrupy, "Good morning! And in case I don't see you, good afternoon, good evening, and goodnight." He tries to break out of this bland suburban cycle, but his struggles to leave are always foiled by the actors or by Christof himself. These escape attempts are frequently accompanied by circular imagery; for instance, after the radio incident where his car picked up the actors' frequency, Truman rotates several times through the revolving door before escaping back outside. In the driving escape

scene discussed above, the cyclical imagery is even more prevalent: the same three people keep walking/driving around the block, and Truman keeps driving around the traffic circle. The employment of this circular imagery when Truman is attempting to break free highlights his impotence in the face of Christof's manipulative control.

Considering the reiteration of cyclical imagery as a symbol for the dystopian entrapment of Truman, Weir's rationale for the choice of minimal music seems evident. Just as the lady on a red bike, the man with flowers, and the dented Beetle "just go round and round ... round and round ..." so too does Truman, and so does the music. Minimalist music—based on the obsessive repetition of motives—has been derided—using similar imagery—as "needle-stuck-in-the-groove music" (the groove, of course, being a circle around an LP).[15] Just as the music obsessively repeats its material over and over, and does not change markedly for new material or move to a true cadence, Truman may try to escape, but is held inside this regulated dystopia by Christof's control.[16] This use of minimalist techniques, signifying Truman's entrapment within this dystopia, fits Rebecca Leydon's description of the "Totalitarian" trope, where "musematic repetition suggests a kind of 'prison house' effect, an inability for the musical subject to break free of an obstinate musematic strategy."[17]

But while this explanation seems cogent for why Peter Weir, the film's director, might have chosen music employing minimalist techniques—as a symbol of Christof's

15 Schwarz, *Minimalists*, 8. The overhead long boom shot of Truman driving around the roundabout actually *looks* somewhat like a LP, with the middle of the traffic circle similar in proportion to a record label, its central protrusion recalling a phonograph spindle.

16 Minimalist music, including "Drive," may employ V-I or other cadential-type chord successions, but they do not have the same sense of relief and goal-achievement as do those of traditional tonal music.

17 Leydon, "Toward a Typology of Minimalist Tropes."

control of Truman—Weir also explains that he was "determining the music that the show's creator, Christof, would have chosen."[18] If this music is also Christof's choice—not simply meta-nondiegetic, but meta-diegetic—why would Christof use music that exposes his entrapment of Truman? Perhaps this meaning of entrapment is not a conscious choice by Christof, but a subliminal one. Certainly the music works well enough as tension music, and many of the cues, "Dreaming of Fiji," "Drive," etc., are simple enough musically that they easily could be improvised by performers in the studio, repeated *ad infinitum* to fit scene length. A close examination of the TV producer's actions, however, reveals a strong need to control Truman and keep him in Seahaven. Though Christof claims that Truman could leave if he really had the will to, the megalomaniacal producer puts every possible obstacle in Truman's way, to the extent of intentionally "killing" off Truman's "father" simply to instill a fear of water so that Truman will have a psychological aversion to trying to escape the island. While Christof has little direct control over Truman's feelings and actions, he uses music to interpret those feelings and actions for the audience, manipulating them, for instance, as previously discussed, with emotional scoring over Truman's reunion with his father. The music Christof uses is perhaps not a direct representation of what Truman feels, but what Christof wants him to feel, what he wants the viewer to feel too. Conceivably, Christof's use of minimal, entrapment music over Truman's bids to escape is yet another means to interpret Truman's actions—suggesting that he does not really want to escape. And

18 Peter Weir, Liner Notes, Burkhard Dallwitz and Philip Glass, *The Truman Show: Music from the Motion Picture*, Milan Records 35850-2.

maybe Christof's megalomania has progressed to the point where, at least subconsciously, he believes that his manipulative musical control over his audience also extends to Truman. By using music that suggests entrapment, an impotence to escape, Christof can use his god-like power to keep Truman ensconced within his island dystopia.

But Truman has other ideas. Faking sleep, he manages to escape the camera's gaze, temporarily circumventing Christof's machinations. Shrugging off aquaphobia, he steals a boat in a bid to escape the island by sea. After surviving Christof's storm (accompanied by "Underground/Storm"), Truman sets sail into a calm blue sea, accompanied by "Raising the Sail" (1:27:37-1:29:26). Yet again, this is a minimalist cue by Philip Glass. Typical of pieces using minimalist techniques, "Raising the Sail" is based on limited, repeating harmonic material: three 8-bar, four-chord successions, iterations of each other (see Example 7.5). These chord successions all begin with G minor and end with a D Major Minor seventh (DMm7). Closely related, their differences are negligible: 1 and 3 vary in their third chord, and those chords are only one step away from each other on the circle of fifths. Chord succession 2's second chord is likewise only one step away on the circle of fifths from 1 and 3's second chord; chord succession 2 gets to its end early, moving to D by its third chord.

Example 7.5: Chord Successions in "Raising the Sail," *The Truman Show*

Chord Successions				
1	g	Eb	FMm7	DMm7
2	g	Bb	D	DMm7
3	g	Eb	Bb	DMm7

Appearing with these chord successions are a “melody” and an oscillating “accompaniment” part. Minimalist music frequently lacks melody, but this “melody” is more motivic than melodic. However, like a melody, it does function as a locus of the listener's attention because of its instrumentation and higher tessitura. There are three variants, all tied to particular chord successions (see Example 7.6, and 7.7 for their linked chord successions). Two start on D (Melody D and D-alt), one starts on G (Melody G); the ends of these vary so they may connect smoothly to the next chord succession and melody. As is characteristic of the minimalist technique, all these “melodies” are diatonic.

Example 7.6: “Melodies” of “Raising the Sail”

Below the “melodies” of “Raising the Sail,” there is a steady, repeating eighth-note “accompaniment” on electric piano—termed accompaniment because it is always lower in pitch and has a steady rhythm more typical of a secondary part than the sustained

pitches of the melodies. The accompaniment's starting pitch may vary, but it is always an oscillation of chord members from the chord successions (see Example 7.6, electric piano part underneath "Melody" D, for an example). The chord successions, melodies, and accompaniment combine as shown in Example 7.7.

Example 7.7: "Raising the Sail" order of motives; octave registers given (C4=middle C)

Measures	1-5	6-13	14-21	22-29	30-37	38-45	46-53	54-61	62-65
Chord Succession	3 (begins *in media res*)	1	2	3	3	1	2	1	2
Melody	(D? begins *in media res*)	G4	D4 drone	D5	D5	G5	D5-Alt	G5	D5-Alt
Accomp. starting pitch	(?)	Bb2	Bb2	D4	D4	G4	D4	G3	D3
Instrumentation	synth/pad strings melody, electric piano accompaniment			piano melody, electric piano accompaniment					

As one can see from these examples, the cue's minimalist nature is clear: it is based on limited harmonic and diatonic melodic modules that repeat, with a steady pulse in the accompaniment.

"Raising the Sail" accompanies what is perhaps the most compelling escape attempt of *The Truman Show*: Truman has beaten both his aquaphobia and Christof's storm to sail into the unknown. Elements of the cue highlight his heroic attempt—the highest tessitura of the piece is achieved at the moment Truman begins to hoist his sail (1:28:40, G5 in melody, G4 in accompaniment). And this apotheosis, occurring at the

beginning of a repetition of Melody G, is closely linked to Truman's earliest dreams of escape. Melody G is a rhythmic variant of the melody of "Dreaming of Fiji," the cue that accompanied Truman's first mention to his friend Marlon of leaving Seahaven. Because the other two melodies within "Raising the Sail" are quite similar to Melody G in both rhythm and chord succession, seeming only to be slight variants, the entire cue appears derived from that earlier music. So what first appeared to be only a fantasy to Truman, a wistful desire to escape Seahaven to visit his illicit college love, Sylvia/Lauren, now dominates his actions; the dream has become a powerful force. But the use of the minimalist technique in this cue reiterates that Truman is still imprisoned in the dystopian world of Seahaven. He is still stuck under Christof's totalitarian control; as the music continues its repetitious nature, so is Truman entrapped in this circular world.

But then his ship's prow plows a hole into the side of the studio wall, revealing that the diegetic reality of Seahaven is nothing but an illusion. He has *literally* broken out of Seahaven, and the music reflects Truman's escape/Christof's loss of control. At the exact moment Truman's boat crashes into the wall, the music comes to a literal screeching halt in the middle of one of its repetitions. It does not simply fade out, like most of the other minimalist cues, their controlling power still in the background, unheard. It is dramatically cut off, *in media res*, not with a cadence, but with a diegetic crash (the wall breaking) and then an unusual sound effect, a pitched whine that sounds like a combination of glissando brass and a train whistle. It is perhaps this dramatic halt that gives greatest credence to the theory that the director chose minimalist music to represent Truman's entrapment and Christof's control of him within this dystopia; the dramatic

cessation of the music's repetition is directly tied to Truman's breaking out. The moment Christof loses control of music, he loses control of Truman.[19] In this dramatic caesura, the scores of *The Truman Show* and *Pleasantville* share a motif—the cessation of music at the moment of a change toward free will. For *Pleasantville*, it was a change from nostalgic utopia to modern town, for *The Truman Show*, a change from entrapment within dystopia to freedom.

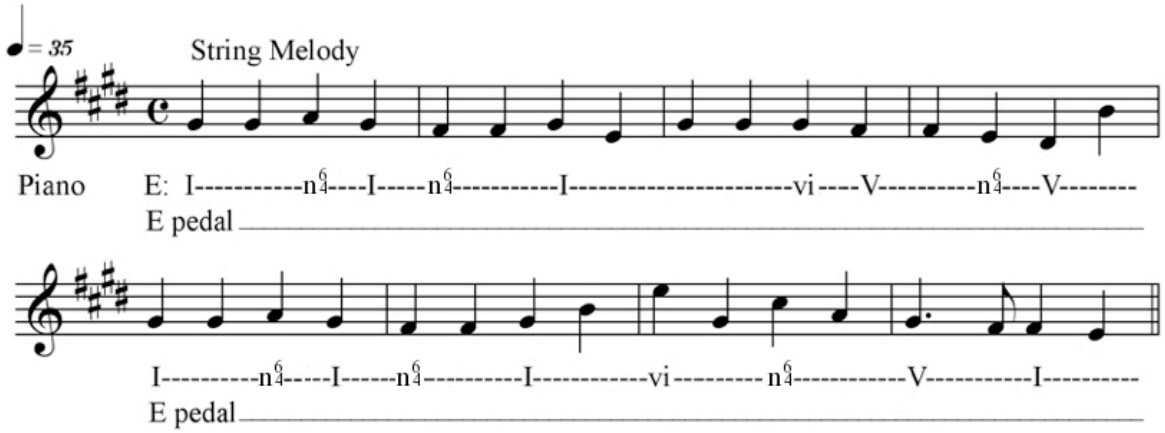
Truman, in wonder and confusion, goes to the wall and touches it. As his fingers graze the painted clouds, a new musical cue begins. The slow, hymn-like piece "Father Kolbe's Preaching," by Wojciech Kilar, almost mickey-mouses Truman's pounding against the wall to get out, imbuing this escape attempt with religious significance. At first, because the piece is practically synchronized with his actions, it seems the music sympathizes with Truman, that it is part of his escape—the cue drowns out any diegetic sound of his arm pounding, replacing it with its own musical power. But as the scene continues, the music's function becomes suspect. Truman "walks on water" (the edge of the studio wall) toward a stairway into "heaven." As he reaches the top, he sees a door with a sign marked "exit." He pushes it open, and sees within the opening only blackness. Not wanting Truman to escape, Christof attempts to regain control of the situation. He speaks to Truman, disembodied, in a god-like echoing voice, while the sun peeks out from the clouds. Truman asks who the voice is, and Christof replies, "I am the Creator ... of a television show." Christof tries to persuade Truman to stay, telling him

19 A megalomaniac losing control of the diegesis at the moment of losing control of the music has also been observed by Royal Brown in Hitchcock's *Shadow of a Doub*t, with score composed by Dimitri Tiomkin (1943). Brown, *Undertones and Overtones*, 71-74.

that the world outside is no better, that Seahaven's dystopia is even to be preferred: "There's no more truth out there than there is in the world I created for you—the same lies, the same deceit. But in my world, you have nothing to fear." "Father Kolbe's Preaching" continues through Cristof's speech, and a close examination of it suggests perhaps a different meaning than that of supporting Truman's bid to escape dystopia.

"Father Kolbe's Preaching" is a simple tune in E Major, its form a parallel period (aa', see Example 7.8). Its simplicity and the extremely slow tempo of the piece suggest a religious topic. Its hymn-like essence is further supported by its instrumentation, characteristic of hymn singing: a melody (strings, filling in for voice), accompanied with homorhythmic piano.

Example 7.8: "Father Kolbe's Preaching," *The Truman Show*



But there are unusual elements in this cue that imply that it has more than religious significance, perhaps a hidden sinister meaning. First, it is repeated four times, with simple tonic chord reiterations between its repetitions. Not only is the whole hymn repeated, but it contains internal repetition—the parallel form. Such repetition is

certainly characteristic of the minimalist cues earlier in the film. Its chord progression is unexceptional, but the use of a pedal point makes what could have been commonplace remarkable. The composer, Kilar, has put the entire piece over a tonic pedal or drone. Thus the cue has no real progression—the piece's cadences lack force. There is no release in the move from V to I, because there is no instability in the V: it appears over a tonic pedal point. Instead of the forward movement customarily intrinsic to the cadential V-I motion, it is rendered impotent, static. Because of its repetition and the tonic static drone, a persuasive argument could be made for calling this cue minimalist; but even if it is not, it has the same function within the film.

Perhaps this music was not simply intended to give religious weight to Truman's final escape, but was chosen by Weir to highlight another ploy by Christof to control Truman, to try to get him to stay. Christof has already put himself in a god-like position over Truman, watching his whole life, creating storms, speaking in a disembodied voice from above, and calling himself the "Creator." He has worked continually to entrap Truman, marking his escape attempts with music that suggests his own authority over the situation. Christof lost control of Truman at the exact moment he lost control of the music, when the minimalist repetition dramatically ceased at Truman's plowing into the wall. Conceivably this new, religious music is Christof's choice; as he attempts to regain power over Truman through his god-like voice, he also attempts to regain control of the situation through religious-sounding music. The repetition of the music and the stasis of its tonic drone reveal this as a totalitarian move, as an attempt to recapture Truman within the confines of the static dystopian world where there is no true freedom, simply

repetition. With such a reading, the mickey-mousing of Truman's pounding against the wall with Kilar's music does not imbue Truman's flailing with the cue's religious power; instead, the overwhelming of the diegetic pounding sound by the music is an attempt to muffle Truman, to halt his escape, to negate his power.

But Truman will not be dissuaded. Having broken out of the dystopian repetition of Seahaven, Christof has lost his power over him. Truman acknowledges his past cyclical entrapment with irony, reiterating his morning greeting, "In case I don't see ya, good afternoon, good evening, and good night," and then taking a bow. He then walks through the open aperture into the black unknown. The music that accompanies his heroic exit ("Opening," by Philip Glass) at first seems promising; it begins with non-minimalist, ascending glissandos and tremolo strings (1:34:50-1:35:11). After Truman disappears, and one sees the audience of "The Truman Show" react to his escape with glee, the music changes. It becomes a repetitious minimalist composition prominently featuring sweeping arpeggios (1:35:12-1:35:46). The music stops at the exact moment "The Truman Show" ceases transmission—Christof's entrapment of Truman has come to an end, both in the physical and the musical sense.

But what comes next, with the end credits, seems striking: a repetition of "Underground," first used when Truman tries to escape to the forest after a sham radiation leak (1:35:56-1:37:23). It is fairly typical for the music of the end credits to be taken from cues used within the film, but why choose to employ a piece employing minimalist techniques—which have represented entrapment and control—when Truman has just escaped from Seahaven, and Christof? Such a choice could not be arbitrary.

The implications of this meta-nondiegetic cue, placed here, are sweeping. The film *The Truman Show* is not intended to be simply a story, but an allegory along the lines of Plato's cave; its implications to extend to the real world.[20] As Truman seeks truth and freedom, so do we; however, as Christof says, "We accept the reality with which we are presented." Truman has just escaped a dystopia, but has stepped into blackness, into the unknown. Christof had warned that the outside world had the same faults as his. The minimalist music accompanying the end credits—featuring white text over blackness, recalling the blackness Truman walked into—suggests that he stepped from one controlled world into another. By extension, Weir intends that *we* question our world—to not simply accept the reality we are presented—especially by the media—but struggle for freedom and truth.

7.2.2 *Gattaca*

The Truman Show is not the only science-fiction film to employ minimalist music as a marker of imprisonment, nor is it the first. A year before *The Truman Show* was released, its screenwriter, Andrew Niccol, debuted another film that utilizes minimalism in a similar way: *Gattaca* (1997).[21] These two films share a genre, screenwriter, a dystopian slant, and a primarily minimalist score. But whereas much of *The Truman Show*'s music was composed by Philip Glass, *Gattaca*'s score was written by minimalism's other prolific film composer, Michael Nyman.

---

20 Robert Castle, "*The Truman Show*'s Sociology: The Show Must Go On," *Bright Lights Film Journal* 49 (August 2005) http://www.brightlightsfilm.com/49/truman.htm (accessed 19 Sept 2007).

21 Timing references from *Gattaca*, DVD, Directed by Andrew Niccol (1997; Barstow, CA: Columbia/Tristar, 1998).

Gattaca (directed by Niccol) is a science-fiction thriller set in the "not too distant future," a dystopia of genetic discrimination. In such a world, identity is by blood sample, and a job interview is not an oral discussion, but a simple testing of one's genetic fitness. *Gattaca*'s protagonist, Vincent (Ethan Hawke), is conceived and born naturally, without genetic modification. From the moment of his birth, his life is proscribed by his genetic code: the doctors pronounce him 99% likely to have a heart defect, with a life expectancy of only 30. Because of this imperfection, his father chooses not to name the boy after himself, saving the first name Anton for his "perfect" second child, conceived with artificial manipulation. Vincent grows up dreaming of traveling to space, but his parents discourage him—because of his "in-Valid" (not genetically superior) status, they both believe and tell him that the only way he will work for a space-faring company is as a janitor. The restrictions of Vincent's world, with its insistence on genetic perfection, have made naturally-conceived offspring a lower class. Because of this genetic caste system, Vincent does end up working at Gattaca, an aeronautical company, as a janitor. But his dreams will not be deterred. Vincent meets with an underground identity broker who introduces him to Jerome Morrow (Jude Law), a genetically perfect man or "Valid" whose car accident left him in a wheelchair. The society, with its emphasis on perfection, looks down on any handicap—even if it is not a genetic one—so Jerome cannot continue his life as he would wish. Vincent essentially takes over Jerome's identity, but since the society is so obsessed with DNA, Vincent must fake being Jerome genetically as well as by appearance, using Jerome's hair, blood, and other bodily samples as proof of his "Jerome" identity.

With Jerome's genetic identity, Vincent is hired at Gattaca, eventually becoming a senior navigator for a mission to Titan. But a week before he is due to depart, the mission director is murdered. The investigation to catch his killer begins as a genetic one—the police vacuum Gattaca and test the samples in a search for those who should not be there. They find one of Vincent's stray eyelashes near the scene, and since he is an "in-Valid" and thus not supposed to work there, they automatically suspect him. Vincent must continue to hide behind Jerome's DNA until the real killer can be found, or until he leaves for Titan. Vincent's life becomes much more difficult as the lead detective, Vincent's brother, Anton (played by Loren Dean) and Vincent's love interest, Irene (Uma Thurman), begin to suspect that "Jerome" is not who he seems. Vincent/"Jerome" is saved from suspicion when the real killer is found, but his brother, Anton, in a fit of sibling rivalry, attempts to usher him out of Gattaca as a fraud. To show Anton that he is indeed capable despite his genetic "inferiority", the two compete as they did in childhood. Triumphant over his sibling, Vincent is set to go to Titan; unfortunately, the company has decided to do a urine test before lift-off, and Vincent is caught unprepared without a Jerome sample. He is saved not because of company policy or a change in society, but through the kindness of an individual. The physician has known all along that Vincent is not Jerome, but has been helping him out of sympathy; the doctor's own son is not genetically "perfect."

Like the music of *The Truman Show*, the score of *Gattaca* reflects the constraint of the individual by a dystopian society; however, in this society, control is wielded not by a megalomanical television producer, but by a caste-based culture that values genetic

perfection above all else. The primacy of DNA in this society—and its role in entrapment—is emphasized from the very beginning of the film. The opening of the movie presents the title credits, shown in white text over a blue screen featuring initially abstract images. The letters A, C, G, and T appear before any of the others in each credit, and these letters remain more prominent than the others as the rest of the credit fades in (e.g., T, A, A appear, only to become "E**T**H**A**N H**A**WKE"). The letters A, C, G, and T are the abbreviations of the bases of DNA: adenine, cytosine, guanine, and thymine. Thus even the presentation of the opening credits highlights the importance of DNA to the narrative. Even the name of the film, *Gattaca*—shared by the aeronautical corporation for which Vincent works—is made up of only these letters.

Behind the opening credits is a blue ground, with objects falling onto it; their striking the ground is marked with exaggerated diegetic sound effects. Eventually these objects are revealed as magnified hair strands, fingernail clippings, and skin cells, shed by Vincent as he performs his morning grooming ritual. The exaggerated size of these bodily ephemera and the amplified sound volume of their fall accentuate their importance; in this society, identity, social status, jobs, and possible future trajectory are all determined solely by the DNA that is contained within these fragments.

With the presentation on the screen of the film's title, the magnified diegetic sounds fade back, and music begins (1:11-3:47). The minimalist cue that scores this grooming ritual, "The Morrow," accompanies Vincent as he incinerates his own bodily samples and outfits himself with Jerome's, fitting a urine pouch to his leg and filling a

fake fingertip pad with Jerome's blood.[22] This music recurs with slight variants every time Vincent/"Jerome" cleans himself—the night after the detectives find Vincent's eyelash (54:15-54:47) and the morning after a tryst in Irene's apartment. Away from his own home and its incinerating equipment, he exfoliates himself on the beach outside her apartment, naked and shivering (1:15:03-1:16:16). The minimalist music fits well with this daily rite; critics have often linked minimalism's repetitious nature with a description of it as mantra or ritual.[23] Leydon has even designated "mantric" as a trope of minimalism, "where endless repetition suggests mystical or spiritual transcendence."[24] But this ritual is hardly the benign one she describes, not a putting off of self and bodily desires to achieve nirvana, but a dystopian negation of self, a masking of one's own identity behind that of another's. Vincent has been forced into this ablution because of his society's prejudice; to succeed within its strictures, he must negate his own body, his self's DNA, and take on another's. Instead of being "mantric," this cue is better described as "totalitarian;" in conjunction with the images the music projects the entrapment of Vincent. Just as the music obstinately repeats itself, making what Leydon calls a "prison house effect," Vincent/"Jerome" cannot truly escape the strictures of this society solely through his own merit, but only through this ritualistic repetition of fraud and trickery.[25:]

But this cleaning rite is not the only example of music in *Gattaca* that participates

22 All cue titles taken from soundtrack recording, Michael Nyman, *Gattaca: Original Motion Picture Soundtrack*, Virgin Records US B000000WF9.

23 For example, Theodore Strongin, "Is Timelessness Out of Style, " *New York Times*, 21 Dec 1969, Section D; John Rockwell, "Music and Theater Offered at Kitchen in a 3-Part Concert," *New York Times*, 21 Feb 1973.

24 Leydon, "Toward a Typology of Minimalist Tropes."

25 *Ibid.*

in creating an image of dystopia. There are several ocean scenes of competition between Vincent and his brother Anton that highlight the difference between Vincent's "in-Valid" genes and the perfection of his sibling's. Vincent describes in a flashback near the beginning of the film how he and his brother's favorite childhood game was "chicken," where the two would swim as far out in the ocean as they dared, before one in fear decided to turn back. There are three sequences featuring this "chicken" game—when the siblings are pre-teens, when they are older teens, and when they are adults in their thirties—all accompanied by variants of the same minimalist cue.

In the first "chicken" sequence, Vincent tries to play "blood brothers" with Anton, cutting himself on a shell and offering it to Anton for him to do the same. His brother drops the shell, refusing with a sneer—thinking his blood and DNA superior—and the two jump into the ocean to compete, to put their wills and genes to the test. Anton proves the stronger, Vincent says, because "he had no excuse to fail." Anton did not win simply because of his genetic superiority, so valued by this discriminatory society, but also because Vincent, like his parents, has bought into the society's belief system. The young Vincent, considering Anton's manipulated DNA an advantage, does not have the will to overcome both his physically smaller body and his culturally-encoded belief. The imprisonment of Vincent within this dystopian doctrine is projected by the music that accompanies this scene.

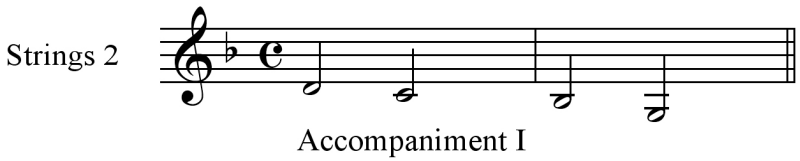
The cue in this, its first iteration (13:46-14:25), is a D minor string piece composed only of two basic motives, A and B, and their slight alterations (shown in Example 7.9, "Strings 1" part). Motive A' is an inversion of A, while Motive B' is simply

a two-beat extension of B.

Example 7.9: Basic motives over first "chicken" sequence in *Gattaca*

The string motives A and B occur over a two-bar descending pattern, also performed by strings, labeled "Accompaniment I" (Example 7.10, "Strings 2").

Example 7.10: Accompaniment pattern for first "chicken" sequence in *Gattaca*



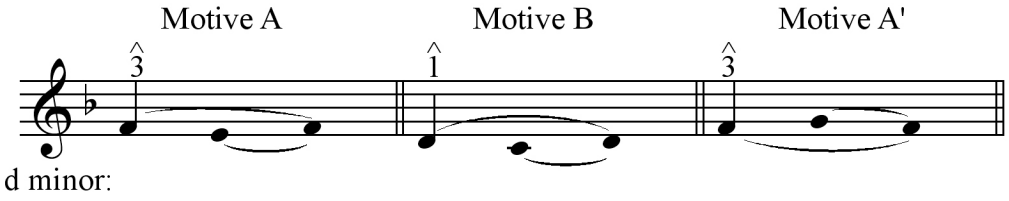
The motives A and B alternate over Accompaniment I as follows: AB AB A'BB' A'B. Motive B's extension in the third repetition of AB (A'BB') is accompanied by the descending String 2 accompaniment pattern moving stepwise all the way down to G with no skip between Bb and G.

This repeating minimalist piece harmonizes well with the filmic images it underscores. Both the ocean setting and the act of swimming prominently feature repeating patterns: the rolling movement of the waves, the reiterated swimming strokes. Just as *The Truman Show*'s "Drive" worked on a low level as tension music, this cue does function at a low level as reflecting the repetitious nature of the images. But this scene is a highly-charged, symbolic one, not just of sibling rivalry but of Vincent's battle of

personal will and spirit over discrimination. The music actively participates with the images in creating this deeper level of meaning. In this particular scene, Vincent loses to his brother in part because of cultural indoctrination; he believes his "lesser" genes give him a "reason to fail." Vincent's entrapment within this credo is reflected by the music's minimalist repetition of motives A and B over this "in-Valid" vs. "Valid" brotherly competition. Just as the motives keep repeating obsessively, Vincent attempts to win over his brother—and, in extension, society—but he cannot move past (at least his belief in) the dysopian valuation of DNA.

But it is not only the repetition of these motives, but their very musical structure that also contribute to this notion of confinement. A reductive analysis quickly reveals that motives A and B (and their derivations) are nothing more than decorative upper and lower-neighbor figures (Example 7.11).

Example 7.11: Reduction of motives A, B, and A'



Both A and B begin as lower neighbors; A' switches to an upper neighbor. Reducing such decorations out, one realizes that motives A and B are mere prolongations of scale degree 3 and 1 of the piece's tonic key of D minor—a simple prolongation of the tonic chord. Thus not only can the musical subject not break out of the repetition of A and B, its motives do nothing but decorate (in a very minor way) the tonic of the key. A and B

attempt to stretch beyond the tonic—moving above or below—but they are constrained by its controlling pull to return to where they began. By extension, Vincent, in this childhood scene, may endeavor to strain beyond the low value this dystopian culture attributes to him because of his DNA—the very attempt to race against his genetically "superior" brother demonstrates this desire—but he is held back by his enculturated discriminatory belief that those with better genes are better.

As Vincent matures, he nurtures a calling for space travel. But on interviewing for a position, he is given a drug test. He knows that this is likely a cover for determining his DNA profile, and that the company will discriminate ("genoism") against him based on his genes. Vincent and Anton's next game of "chicken" follows this bitter disappointment, with Vincent stung by the harshness of the culture against his dream. Before their race, Anton says, "You know you're going to lose," but Vincent, frustrated against society, is now full of determination. The music that accompanies this competition, entitled "The One Moment" (16:55-18:21), begins, as it did in its earlier occurrence, with a simple repetition of A and B. But the moment he says in a narrative voice-over, "Every time Anton tried to pull away, he found me right beside him," the music adds a new motive, motive C (Example 7.12, begins at 17:26).

Example 7.12: Motive C in "The One Moment"

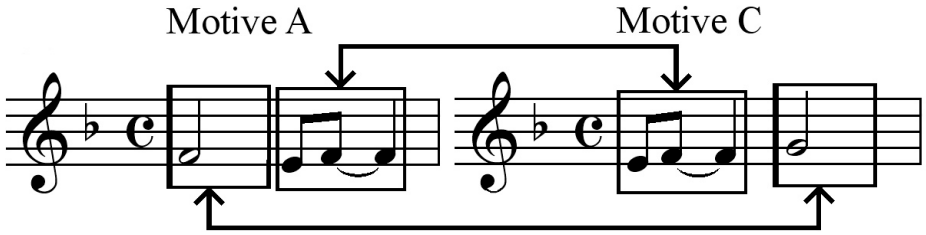
This motive repeats four times in a row as Vincent pulls away from his brother, for the first time out-swimming him. Synchronized with this image of Vincent moving ahead of his sibling, this motive is linked with a striving beyond, a meaning which is supported by the motive's musical structure. Motive C is an upward gesture, quite unlike the neighbor tones of A and B, which tried to move away, only to be pulled back to their original pitch. Unlike A and B's tonic entrapment, motive C pushes up to G, above and out of the tonic chord.

This movement to G, prominently displayed by motive C, not only suggests a sense of striving, but also leads to a possible reinterpretation of the cue's original iteration. In its first occurrence, the music twice repeated motives A and B—lower neighbor figures—and then A switched to A', an upper neighbor. The upper neighbor decoration of A', G4, is the same pitch that is the end goal of motive C. In motive A', G was an accessory to F. In motive C, G has become the aim, and F the accessory. Perhaps this motivic alteration is not a simple variation, but a foreshadowing of the new motive. This new musical interpretation leads to a shift in meaning of the original ocean competition cue: even within the imprisoning repetition of motives A and B, the pitch G—introduced as an upper neighbor—gives a hint of hope, a glimmer of the yearning motive that is to come, a possibility of transcendence beyond society's strictures.

In addition to motive C's new pitch gesture, it is also different rhythmically from A and B. It is a rearranged version of the rhythm of A/B, their first two beats becoming C's last two, and A/B's beat three and four becoming C's beat one and two (Example 7.13). This rhythmic order flipping also contributes to the motive's sense of striving

beyond—not only do the pitches go outside the tonic's control, but the rhythm breaks out of its original order.

Example 7.13: Rhythmic switching from motives A/B to motive C



It is this aspiring motive C that accompanies Vincent's moving past the bounds that his society had drawn for him; not only does he out-perform his genetically "superior" brother, but he has to save him from drowning. As Vincent narrates, "It was the one moment in our lives that my brother was not as strong as he believed, and I was not as weak. It was the moment that made everything else possible." It is this moment that shows Vincent's determination to strive beyond the role that his society has laid out for him, this epiphany that proves to him that it is not simply genes that determine fate, but will, fierce tenacity. With newfound resolve, Vincent decides to follow his celestial ambitions despite the strictures of his culture, and in the very next scene he leaves his parents' house to pursue them.

But while the upward-striving pitches of motive C and its rhythmic rearrangement do suggest a moving beyond the bounds of society, this sense of victory is muted. Through the rhythm is different from that of the imprisoning motives A and B, it is still composed of the same two-beat units; their order is simply reversed. This change is not a radical one, just a permutation. The same could be said of motive C's new pitch gesture.

Its continuous upward motion deviates from the neighbor figures of A/B, but at the same time, it is—like them—only a three-note figure, with all notes related to each other by step. Even its pitch content (EFG) is the same as the combination of motives A (FEF) and A' (FGF), and in the same octave register. Though the change in motive suggests Vincent's determination, its recycling of the same rhythmic units and pitch content reiterates the constraints of his society.

The final recurrence of this minimalist cue occurs after the true murderer of the mission director has been discovered. Though Vincent should no longer be pursued at this point, he realizes he still must have a confrontation with the lead detective on the case, who, in a twist of fate, is his brother, Anton. Vincent/"Jerome" returns to Gattaca, only to find his "Valid" sibling sitting at his desk. After Vincent questions his brother's presence at the company, Anton declares, "I have a right to be here, you don't." The detective accuses Vincent of fraud, believing that he does not have the genetic right to be employed at Gattaca. Anton attempts to usher his brother out of his hard-earned career, to "save" him, but Vincent rails at his sibling's discrimination, "Even *you* are going to tell me what I can and can't do now? In case you haven't noticed, I don't need any rescuing." In a bid to convince his brother that genes should not matter, that he deserves his hard-earned status, Vincent brings up their teenage game of chicken—when Anton needed the rescuing. Justifying the loss in his own mind—still enculturated with the bias that genes determine worth and fitness—Anton maintains that Vincent didn't really beat him, rather "I beat myself." To prove whose paradigm is correct, Anton and Vincent head to the beach one last time—not simply in a battle of sibling rivalry, but in a symbolic duel over

the discriminatory culture's value-system.

The scene changes from Gattaca to the night-darkened ocean, with the sound of a wave crashing against the shore giving way to the minimalist cue that has accompanied all these battles (1:30:44-1:34:05, this occurrence titled “The Other Side”). The music begins at a glacially slow M.M. 15—the slow tempo giving an epic weight to the figures standing at the edge of the shore—with motives A and B harmonized with Accompaniment I. With a cut to Anton swimming in the waves, the music regains the M.M. 60 of its earlier iterations, but it now features an eighth-note accompaniment pattern II (the beginning of this pattern is shown in Example 7.14, see Example 7.15 for an outline of the entire cue), the faster notes adding forward movement to the piece.

Example 7.14: First two measures of Accompaniment II and II'[26]

After only four measures of AB at this new tempo, motive C is reintroduced (mm. 7-8); though Vincent has not yet pulled away from Anton, the employment of this motive imbues the protagonist with the forward-reaching associations linked to its earlier use. The music has to pull back in dynamics and tempo for dialogue between the siblings in m. 13—Anton believes they have swum too far, but Vincent eggs him on, asking if he

26 N.B.: These measures are examples only, the accompaniment pattern does not retain these exact pitches throughout the piece, though they frequently occur in this order or in cells taken from these measures. Accompaniment II as shown occurs in mm. 3-4, and Accompaniment II' as shown occurs in mm. 18-19, 26-27.

wants to quit.

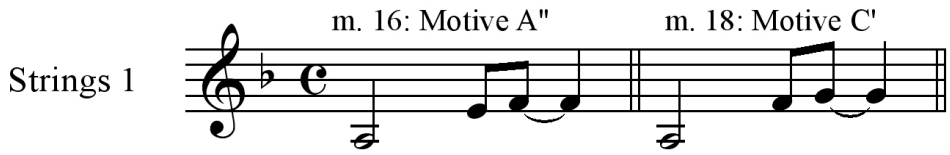
Example 7.15: Outline of *Gattaca*'s "The Other Side"

Measures	1-2	3-10	11-13	14-19	20-25	26-37	38-41
Time	1:30:42	1:31:07	1:31:37	1:31:59	1:32:23	1:32:49	1:33:38
M.M.	15	60	60 (m. 13 slow)	60	60	60	40
Instrum-entation	strings	strings	strings	strings	flute, clarinet	strings, add piano in m. 29	strings
Motives	AB	AB and their variants, C m. 7-8	AB, then drone in m. 13	A, B, C variants	A, B and variants	A and variants, C in m. 30, 32-34	ABA'B"
Accomp-animent	I	II	I	II, II' in m. 16-19	I	II up 8va, I' on low strings	harmony

Anton refuses to be beaten by his "in-Valid" brother, so they resume swimming as the music swells to the fore with another repetition of AB (mm. 14-15). Following this repetition, the accompaniment changes once more, this time to sixteenth notes (Example 7.14, Accompaniment II'). The switch to measured tremolos in m. 16 lends even more energy to the work, implying a move toward some kind of climax in the diegesis. That anticipation is furthered by a change in String I's motives; in m. 16 and m. 18, motives A and C are altered so that they begin with the pitch A3 (Example 7.16). This new pitch, which has never before appeared in motives A, B, or C, contributes to a sense of immanent climax, especially since this wide interval has never been a part of the stepwise String I motives. Its effect, however, is tempered by its low register—not furthering the upward-striving of motive C. It is also neutralized by the rhythmic change in C. While

in its earlier iterations motive C had reversed the two-beat units of motive A and B, in m. 18 it seems to have regressed, taking on the rhythm of the constraining motives A and B.

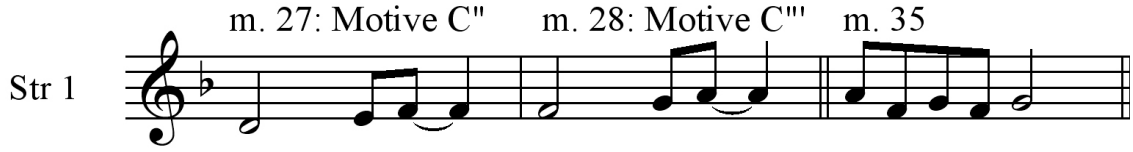
Example 7.16: Measures 16 and 18, String I part



The music pulls back again in mm. 20-25, with a quieter, woodwind instrumentation (flute on motives A and B, clarinet on Accompaniment I) so that the dialogue may be foregrounded. Anton does not understand how his brother is capable not only of this aquatic feat of strength but of all he has accomplished: "Vincent—how are you doing this, Vincent? How have you done any of this? We have to go back." Vincent retorts, "You wanna know how I did it? This is how I did it, Anton—I never saved anything for the swim back." On the heels of this declaration of sheer will, the music returns in m. 26 with strings in full force, and adds piano in m. 29. Amplifying the power of Vincent's words is Accompaniment II—raised by an octave—and the addition of Accompaniment I' on very low strings, with notes doubled through measured tremolos. With the marshaling of these new resources, the music has traversed far beyond its original bounds; motivically, it has also departed beyond its original obsessive repetition of AB. The new section that begins at m. 26 starts with motive A, but is followed by motives derived from C on differing pitch levels. In m. 27, motive C" begins on the tonic pitch (this motive also occurred in m. 25). In m. 28, C"' begins on F4 and traverses past

its original aim—G4—to reach A4 for the first time (Example 7.17). This A was foreshadowed by the low A3 in mm. 16 and 18; now A4, it seems to take its place as the goal to which motive C has striven.

Example 7.17: Measures 27-28, 35



There is another measure of motive C in m. 30, then a reiteration of it in mm. 32, 33, and 34 as Vincent searches for his sibling, who has disappeared beneath the waves. The striving of motive C in m. 34 leads all the way up to the first note of m. 35, A4. Now this new pitch is expressed as the first of a rhythm completely unique to the String I part: a group of eighth notes (Example 7.17). This particular A4, however, must not yet be the climax of the work, since the music quickly moves back to the striving G4 by the end of the measure, driving the music forward. The music broadens, stretching with a *ritardando* as Vincent dives for his brother (mm. 35-37); it *crescendos* as he brings him up to the surface.

With this reiterated emphasis on the "striving forward" motive C, its arrival on the new goal pitch A4, the new motivic rhythm in m. 35, the changes to a fuller instrumentation and accompaniment, and especially the *crescendo* and *ritard*, one expects this to be a breakthrough moment for Vincent. The cue has definitively moved out of the totalitarian, "prison house effect" of the restrictive repetition of motives A and B found in the cue's first iteration, when Vincent was still inhibited by societal constraints; instead, it

emphasizes a motive—C—that has become associated with Vincent's moving past his society's expectations through sheer persistence. With this new rescue of his brother in a symbolic battle of genes versus spirit, it seems as though Vincent has moved to a point similar to the end of "Raising the Sail" in *The Truman Show*. Truman finally escaped Christof's totalitarian control when he musically and physically broke through, with the music's dramatic cessation. Though the *ritard* and *crescendo* seem in this, *Gattaca*'s breakthrough scene, to telegraph a climax—not suggest a dramatic caesura—the listener/viewer expects something in the music to mark Vincent's triumph over a discriminatory society.

But what comes is a splash, and then—*piano* and *largo*—motives AB A'B", simply harmonized, and ending with a tonic triad. Following music that suggests a breakthrough, a triumph over the strictures of this dystopian society, the reiteration of motives associated with that discriminatory culture takes one aback, seeming to negate Vincent's victory. It does not deny his tenacity, however, but simply puts his achievements into perspective. A re-reading of the music that seemed to lead up to a possible breakthrough supports this muting: though the A4 seemed to be the goal of the striving of motive C, the pitch is only a prolongation of the tonic, D minor, a static harmony from which the music never departs. And this symbolic battle between Vincent and Anton does not mark a revolutionary triumph over social prejudice: Gattaca will not now accept all "in-Valids" as workers; it would not even accept him if it knew his true status. After this show of courage, Vincent will have only proved himself to his sibling, changing his perspective; it will not change all of society—though later scenes reveal that

his tenacity has also changed the worldviews of his lover and doctor. This echo of motives A and B, quietly, insistently, reminds the viewer that Vincent's achievement is a only a personal victory, one not achieved solely by will but also by deception. Unlike Truman, Vincent has not broken out of dystopian entrapment (though the following music suggested Truman simply moved to another dystopia); he must continue to deny his own body and pretend to be another to succeed within the one in which he is still imprisoned.

7.3 Minimalism and Anempathy

7.3.1 *The Thin Blue Line*

In addition to its engendering a sense of entrapment in science-fiction film, minimalist music has also served a dystopian function in non-fiction film. In director Errol Morris's documentary *The Thin Blue Line* (1988), Philip Glass's score is used to help create a meaning of dystopian anempathy. But the film's identity as a documentary presents problems for this—or any—musical interpretation. Available models for film music analysis, including Gorbman's landmark *Unheard Melodies*, are based on the conventions and functions of music within fiction film. Even Nicholas Cook's *Analysing Musical Media*, which claims to address every kind of interaction between moving image and music (music video, film, commercials), does not include any analyses of non-fiction media. With no available, tested academic models for interpreting the function of music within the documentary genre, one may either invent a new model from examining numerous documentaries—a time-consuming task that would be a dissertation in itself—or employ available models, making certain to asses their degree of applicability. For

pragmatic reasons, I choose the latter.

The documentary, by its very nature, is supposed to document reality, to "present factual information about the world outside the film."[27] Such a film is often assumed to be objective.[28] The dominant mode of documentary making at the time Morris released *The Thin Blue Line* was cinema vérité, in which the director was supposed to be a "fly on the wall," an objective observer of events.[29] But though put forth as an ideal, this objectivity, of course, is impossible. Directors—by virtue of the limitation of perspective—cannot be completely objective; they possess discrete points of view grounded in their social, cultural, and ethnic status. The very act of editing reveals the stamp of subjectivity: what does the film include, and in what order? Consider, for example, the recent flap over Ken Burns' *The War* (2007); he was accused of bias by omission, of not addressing the efforts of Hispanics in World War II. Though objectivity is an impossible ideal, documentaries usually have an a*ppearance* of objectivity, and an audience assumes (unless proven otherwise) that the information presented in these films is true.[30] To present these facts, documentarians utilize "talking head" interviews of witnesses or scholars, pre-existing or newly shot footage of events, newspaper clippings, and occasional reenactments.[31] Errol Morris's documentary is different from the customary "objective" style—a topic which will be addressed—but its aim is still an

27 Bordwell and Thompson, *Film Art*, 42.
28 Michael Rabiger, *Directing the Documentary*, 4th ed. (Burlington: Focal Press, 2004), 8.
29 Katherine Speller, "Cinema Vérité: Defining the Moment," *Senses of Cinema* 11 (Dec 2000-Jan 2001), http://www.sensesofcinema.com/contents/00/11/verite.html (accessed 20 Oct 2007); Philip Gourevitch, "Interviewing the Universe; Errol Morris."
30 Bordwell and Thompson, *Film Art*, 43. Recent exceptions are the subjective, political documentaries of Michael Moore.
31 *Ibid*.

attempt to discover—detective-style—the truth.

How might music interact with this genre, in which facts are customarily given precedence? What tensions exist between an "objective" film and its music? According to Gorbman, in a narrative fiction film, music may evoke a sense of "time, place, and stock characterization" and serve as a "signifier of emotion;"[32] I would argue that it often continues these functions even within the realm of nonfiction film. Ken Burns and Lynne Novick's World War II documentary *The War* (2007) features big band swing music, a popular musical style of the era.[33] David Grubin's documentary *The Jewish Americans* (2008) features a cantor and several cello solos.[34] But these musical choices are not neutral, not objective. Their intrusion has both an emotional and interpretative effect on the audience. In *The War*, "Episode Five: FUBAR," perky, major-key jazz accompanies Allied paratroopers jumping out of their planes above Holland. While this music does provide a sense of time—of the 1940s—it also imbues the archival footage with a joyous or happy sense, emotionally interpreting the scene for the audience. In *The Jewish Americans*, episode two, "The Best of Times, the Worst of Times," a spare, somber cello solo, heavily inflected with tritones, accompanies pictures of Roosevelt after he has learned of Hitler's "Final Solution" for the Jews. The funereal tempo of the solo and its dependence on the dissonant tritone make the use of the tune emotionally and interpretively loaded. The melancholy attributes of the music are then transferred to the

32 Gorbman, *Unheard Melodies*, 79, 83.
33 *The War*, "Episode Five: FUBAR," first broadcast 30 Sept 2007 by PBS, Directed by Ken Burns and Lynne Novick.
34 *The Jewish Americans*, " The Best of Times, the Worst of Times," first broadcast 16 Jan 2008 by PBS, Produced by David Grubin.

images it accompanies, imbuing the scenes of Roosevelt with a sense of deep sadness over the Jewish plight, an emotion the audience is then also brought to feel. The same principles apply to other uses of music within documentary films. To an audience familiar with and steeped in the conventions of fiction movies, music, even in documentary film, frequently serves to manipulate the emotions, to shade interpretation.[35]

This creates a tension with the assumptions of the documentary. The genre purports to present facts, often claiming objectivity, but the use of music—and its emotional associations—may lead an audience to particular conclusions or emotional readings they might not have reached without this musical prodding. Because of this effect, many documentaries or other fact-oriented media restrict the use of music; for example, to help keep their reputation as "unbiased" journalism, it is the policy of CBS and ABC news never to use music (except naturalized source music) over "hard," fact-oriented, supposedly "objective" news, only employing it over "light" human-interest features.[36] These TV corporations understand music's function as a signifier of emotion, and believe "its presence would fictionalize and corrupt a factual story."[37] This view of music as a locus of emotion, interpretation, and subjectivity within the documentary realm—fulfilling much the same function it does within the fiction film—allows one to

35 A familiar example is the nature documentary. In this subgenre, music is used to imbue animals and their actions with particular emotional interpretations. Royal S. Brown gives an example of a snake documentary: "It offers such doom and gloom bombast on the music track every time one of the film's subjects such as a python makes a kill that the viewer can have little doubt as to how the filmmakers want him or her to feel, even though the film purports to be... an objective portrayal." Brown, *Overtones and Undertones*, 15-6.

36 Gillian B. Anderson, Thomas L. Riis, and Ronald H. Sadoff, "Introduction," *American Music* 22, no. 1 (Spring 2004): 10-11.

37 *Ibid.*

analyze its music using the same tools and vocabulary developed for fiction film.

Let us turn now to Morris's documentary. *The Thin Blue Line* is not a film within the objective, cinema vérité tradition; instead, it has been called a documentary-fiction hybrid or a self-reflexive postmodern documentary.[38] Its story is one of miscarriage of justice, concerning Randall Adams, a man scapegoated for the 1976 murder of a police officer in Dallas. Morris does not simply give the facts as would be the case in an objective documentary—he does not assert that Adams is innocent, and then present evidence to prove this is the case—but shows how the line between fact and fiction, subjectivity and objectivity, can be blurred, the "truth" contingent on the personal interests and perceptions of those involved. To present the case, the director combines a series of interviews of judge, police, defense attorneys, witnesses, and accused, with stylized film noir-like staged reenactments of their testimony. Thus the story of what happened is told from multiple, conflicting points of view, all personal "truths," but not necessarily "facts." Through the gradual accumulation of testimony, evidence, and the discrediting of witnesses, Morris gradually makes a position emerge: that Adams was falsely accused by the juvenile David Harris, who committed the crime, in an attempt to escape responsibility for it; and that the corrupt legal system actively participated in Adams's scapegoating. Though this picture is emergent, neither Morris nor any witnesses explicitly state this is what actually happened. Morris never presents a reenactment showing Harris killing officer Wood, and even in Harris's closing taped "confession," the

38 Bordwell and Thompson, *Film Art*, 46; Linda Williams, "Mirrors without Memories: Truth, History, and the New Documentary" *Film Quarterly* 46, no. 3 (Spring 1993): 11.

criminal avoids directly stating that he committed the crime. Thus, though the truth of what occurred can be gathered from the evidence, it remains elusive—though no less powerful.[39]

The place of music in such a documentary is a complicated one. If music in documentaries continues to signify emotion and shade interpretation, it could easily be used to promote one view of events over the others. Morris does not customarily take this tack with the filmic elements of this documentary; instead of obviously privileging certain witnesses and readings from the start of the film, he gradually lets a particular picture become clear—albeit one he has intentionally structured the film to promote.[40]

To tease out the meaning of the score—to see if it participates in the emergent meaning promoted by the director, shades interpretation, or fulfills some other function—it is revealing to examine the cues appearing over similar filmic events. In *The Thin Blue Line*, music frequently occurs over flashbacks, reenactments of the testimony given by the different players in the case. A recurrent reenactment is the crime scene and murder of Officer Wood.[41] All these sequences show different details because they portray the story from different tellings: Dallas police, "witnesses," and Adams recalling the testimony of Harris and Wood's partner (see Example 7.18 for a list of cues and points of

39 Williams, "Mirrors without Memories," 11.

40 Though his privileging is not immediately apparent, his lighting, camera work, and editing are a subtle force toward interpretation. Take, for instance, the camera's view of David Harris. It never shows his hands—handcuffed—until Morris chooses to reveal details of his heinous criminal past. Morris has thus intentionally withheld evidence that would have likely presented a stronger bias if presented to the viewer earlier. But its use here gives stronger weight to the recounting of his crimes. Williams, "Mirrors without Memories," 12.

41 I have included all the reenactments that are more than just a second or two that portray the story as told/recalled by the person interviewed. Not all show the shooting, but all are about and reenact elements of the crime. Besides the ones that recall/act out these stories, there are a few more short reenactment segments (such as that at 1:07:17-1:07:23), but these are not extended.

view). Recollections from the same point of view use variants of the same music; e.g., all C minor examples accompany police testimony or are recounted as what police said in court. All but one of these crime reenactments are accompanied by Glass's music. The only exception is presented by the Dallas police as simply speculative (13:29-14:16), guessing what Wood's partner was doing during the crime; perhaps this testimony is not accompanied because it is presented *as* speculation—all the others are presented as "true" accounts of what took place.

Example 7.18: Musically accompanied crime testimony reenactments

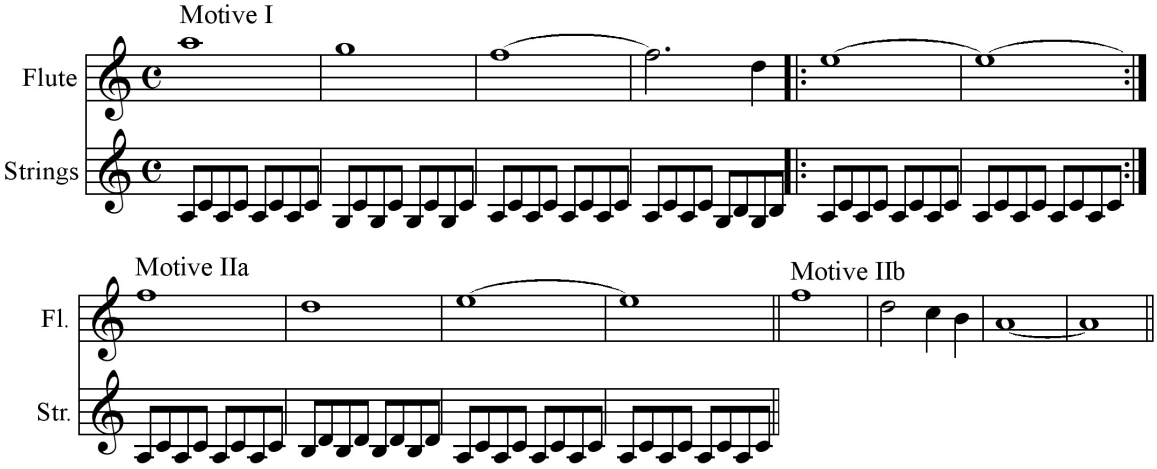
Musical Cue	POV	Shows murder shots?	Mode	Tempo (approx-imate)
:27-5:50 (4:12-5:13 is reenactment)	Establishing reenactment, not told from particular POV	yes	A minor	M.M. 100
10:17-12:33	Dallas Police	yes	C minor	M.M. 116
30:00-31:18	Dallas Police	no, shows Vega speeding away after crime, partner shooting at vehicle	C minor	M.M. 116
41:44-43:20	Adams tells Harris's testimony	no, but shows gun drawn and Wood dead on ground	E minor	M.M. 92
45:38-47:39	Adams tells Wood's partner's testimony	no, shows Wood walking up to Vega	C minor	M.M. 116
50:34-54:26	"Eyewitnesses" Emily Miller and R.L. Miller's testimony	yes	G minor	M.M. 100
57:42-59:35	"Eyewitness" Michael Randell's testimony	no, shows Wood walking up to Vega	D minor	M.M. 108
1:21:06-1:22:38	"Eyewitness" Michael Randell's testimony	no	D minor	M.M. 108
1:23:26-1:25:43	"Eyewitness" Emily Miller's testimony; changes to Harris	yes	G minor	M.M. 100

	detailing picking Adams out of police lineup, then Harris's later drunken driving			

What is striking about these musical cues is that none of them "react" to Wood's murder. In conventional film scores, there will be a correspondence of the music with the peaks of emotional intensity in the dialogue or scene; a murder, as a striking and heinous event, will usually be marked with a stinger or some other dramatic device. But neither the scenes that actually show the murder itself nor the cues that present details before or after the crime seem to acknowledge this event musically; there is a lack of strong correlation between the music and what is happening.

The first musical cue that underscores a murder reenactment directly follows the opening credits and title music (0:27-5:50); it accompanies establishing shots of Dallas and initial interviews with Randall Adams and David Harris. This piece is composed of Motives I, IIa and a variant of IIa, IIb (Example 7.19), arranged in a repeating pattern as shown in Example 7.20.

Example 7.19: Motives of *The Thin Blue Line*'s 0:27-5:50 cue



Example 7.20: Order of motives in *The Thin Blue Line*'s 0:27-5:50 cue

Time	Motive
:27-:44	oscillating A3-C3 (as found in later accompaniment)
:45	I
1:03	I
1:22	IIa
1:30	IIa
1:38	IIb
1:46	I
1:54	I
2:03	IIb

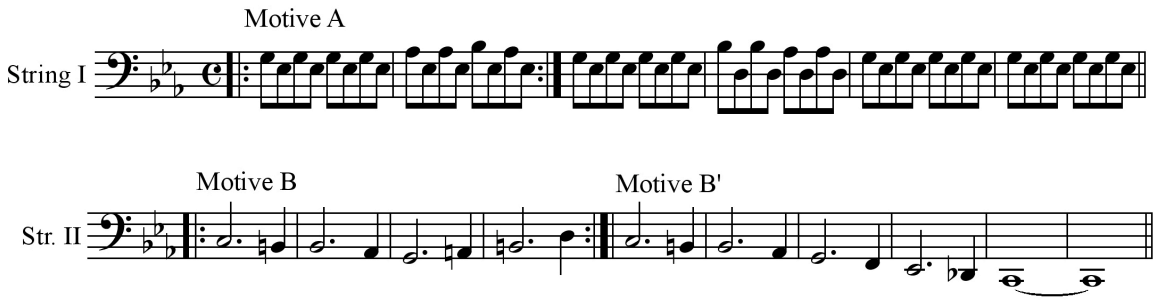
Time	Motive
2:14	oscillating A3-C3 (as found in later accompaniment)
2:40	I
3:02	I
4:27	IIa
4:36	IIa
4:47	IIb
4:57	I
5:07	I
5:16	IIb
5:26-5:50	oscillating A3-C3

The flute, doubled perhaps by synthesizer, plays the main motives, with strings performing an accompanimental eighth note oscillation (see second stave of Example 7.19; Motive IIb has the same accompaniment as IIa). As Example 7.18 notes, the crime reenactment takes place near the end of the cue, at 4:12-5:13; it begins in the middle of a repetition of Motive I (see Example 7.20 for times). Not only does the crime reenactment sequence begin within the musical cue and within a repetition of I (i.e., not synchronized with either the beginning of the music or the beginning of the motive), the murder itself occurs within a motivic repetition: at 4:52, during Motive IIb. Motive IIb's descent to tonic has a closing function, but since it occurs several times prior and once after the murder itself, this motive is not linked only to the death, marking it apart. The music continues its repeating pattern, not acknowledging the death in any way; there is no

musical drama: no dynamic or tempo changes, no instrumentation alterations, just a continuation of the motive.

The cue accompanying the Dallas police's point of view is quite similar. It also consists of two motives, with a variant on the second (Motive A, B and B'; Example 7.21). The music is composed of two string parts, with String II's Motive B and B' doubled by bassoon. When Motive B comes in, the String I part changes slightly to become an accompanimental pattern similar to Motive A. The first occurrence of the police cue occurs at 10:17-12:33 as shown in Example 7.22.

Example 7.21: Motives of police's C minor music (10:17-12:33), *The Thin Blue Line*



Example 7.22: Order of motives in first police cue, 10:17-12:33

Time	Motive
10:17	A
10:33	A
10:48	B
11:04	A
11:21	A
11:37	B
11:53	B'
12:09	B
12:25	B', fade out

Again, the bloodshed is not acknowledged by the music: the gunshots occur at 11:11 and 11:24, in the middle of modular repetitions of A. The music plays on, seemingly unaware of what has occurred. After the shootings, there is another repetition of B and then the music shifts to B'. One might suggest that this change to B' (and its melancholy descent with a flat second scale degree) is some kind of reaction to the gunshots, but the basic rhythm, tempo, and harmonic scheme do not change, making this alteration an insignificant one. The switch to B' is also distant enough in time from the gunshots that, instead of sounding like it is triggered in response to the crime, it sounds like a product of musical logic.

The reason these cues' lack of reaction is so striking is because of their difference from customary film music practice. In typical fiction film scoring, acts of violence such as murder are customarily marked aurally, with music or dramatic non-diegetic sound effects. Either the music stops for the shots or stabs, making them sinister by its absence, or the music marks them with stingers and other dramatic devices. For instance, the famous shower scene in *Psycho* punctuates knife slashes dramatically with shrieking strings. The music leading up to danger is also usually telling; one can identify incipient savagery either by a low, rumbling pitch—according to Philip Tagg, a "megadrone"—or by increasing, menacing dissonance.[42] A score's marking of murder is connected to music's function as emotional signifier; scenes of violence are loci of strong feeling within film, and thus are often emphasized through music.

42 Philip Tagg, *Introductory Notes to the Semiotics of Music*, v. 3.2 (2000) http://www.tagg.org/xpdfs/semiotug.pdf (accessed 7 Nov 2007), 20.

Glass's score, though accompanying a murder, does not acknowledge it, but continues, unheeding. As Morris explains, "It's one thing to use traditional movie music that's pegged to directly comment on a specific scene—but Philip's music doesn't work that way ... it does create this background against which the actual narration emerges."[43] Reaction or synchronization of the music with dramatic events is possible with the minimalist technique—both *Kundun* and *Gattaca* have this correspondence—but it is also possible, as in this film, to have none. The music certainly does not comment directly on this scene: it does not foretell danger through dissonance, nor mark the death with drama. The score over these reenactments *is* typically slow (the prominent motives are whole notes or dotted-halves), and in a minor mode, so it does lend a sense of melancholy, but the score still seems detached from events. These effects are informed by the very nature of minimalist music; its slow, gradual change rate does not allow for the dramatic devices associated with expressing the suddenness of violence: dissonance and stingers are completely uncharacteristic. And minimalism's lack of romantic melody makes it difficult to express a deep sense of tragedy about the crime, so easily accomplished by the melodic clichés of the conventional film scoring style. This emotional detachment from the murder is accentuated by the images; as stylized, film-noir reenactments, they also seem to create a distance from the events they portray.

By not reacting to Officer Wood's murder, only giving the reenactment sequences a wash of minor mode melancholy, what does Glass's score accomplish? There are many

43 Errol Morris, "The Legendary Errol Morris Comes Out from Behind *The Fog of War* for Film Freak Central," interview by Walter Chaw, http://filmfreakcentral.net/notes/emorrisinterview.htm (accessed 1 Nov 2007).

such reenactments, and marking the death each time with a dramatic device could easily have become excessive, calling attention to the musical devices as artifice, dampening their power. Marking only some of the reenactments would likely have privileged certain tellings of the story, guiding the audience's interpretation as to which one was correct. By not marking any of the deaths in the reenactments musically, have Morris and Glass achieved what has been thought impossible: musical objectivity? Have they managed to not musically lead the viewer to any particular emotional interpretation of these—or other—scenes?

Reviews of *The Thin Blue Line*'s score belie this possibility. Roger Ebert refers to Glass's music as "cold, frightening," while Philip Home of London's *The Daily Telegraph* names it "gloriously menacing."[44] Desson Howe of the *Washington Post* called the score "pointedly eerie," while Janet Maslin of the *New York Times* says the film is "colored" by its "ominous hum."[45] In interviews, Errol Morris himself says he uses the music of Glass because, "He does existential dread better than anybody."[46] When listening to this music without the images or dialogue, however, one does not come to this interpretation of terror. If one performs the music shown in Example 7.18, for example, one hears minor mode, repeating motives and a steady pulse, not music that automatically registers an

---

44 Roger Ebert, "The Thin Blue Line," *Chicago Sun-Times*, 16 Sept 1988, http://rogerebert.suntimes.com/apps/pbcs.dll/article?AID=/19880916/REVIEWS/809160305/1023 (accessed 1 Nov 2007); Philip Home, "10 Documentaries that Shook the World...," *The Daily Telegraph* (London), 4 Aug 2007, Section Art.

45 Desson Howe, "The Thin Blue Line," *Washington Post*, 2 Sept 1988 http://www.washingtonpost.com/wpsrv/style/longterm/movies/videos/thethinbluelinenrhowe_a0b1bb.htm; Janet Maslin, "Anatomy of a Murder: A Real-Life Whodunit," *New York Times*, 26 Aug 1988, http://movies.nytimes.com/movie/review?res=940DE2DA1F30F935A1575BC0A96E948260 (accessed 1 Nov 2007).

46 Errol Morris, "The legendary Errol Morris," *ibid.*

emotional interpretation of eeriness like Ligeti's *Requiem*—which has this affect even outside the filmic context of *2001: A Space Odyssey*. There is something about Glass's music's interaction with what is on the screen that suggests this frightening affect, something that is not an attribute of the music taken by itself.

Perhaps this dread arises *because* the music does not emotionally grapple with the policeman's death, does not react to the images on screen. Gorbman, following Chion, calls music that is "indifferent" to the dramatic situation "anempathetic."[47] Such a sense of detachment might seem to be a valued commodity in a documentary film, not provoking an emotional reading, remaining neutral or objective. But there is a problem: music is rarely perceived as neutral; it is enculturated as a locus of emotion and interpretation. This type of music, by "its very emotionlessness, juxtaposed with ensuing human catastrophe, is what provokes our emotional response."[48] Perhaps the menace observed in the score is because of this anempathy—that the music does not seem to care about Wood's murder. It remains aloof, emotionally distanced.

But perhaps there is more to this interpretation than a simple labeling of the *music* as anempathetic. The director had any number of choices when selecting music and its placement. He could have opted to omit music over the reenactment scenes, lending them a sense of realism. But Morris's reenactments are not in a realistic style, but stylized, even surreal, with some events—like the tossing of Wood's partner's malt—taking place in slow motion. There is one full reenactment that is not accompanied

47 Gorbman, *Unheard Melodies*, 24.
48 Gorbman, *Unheard Melodies*, 24.

(13:29-14:16), but it is not presented as witness testimony, but simply as a speculative idea presented by one of the Dallas police officers. All murder reenactments that are told as recountings of the event are scored. So Morris chose to score all versions of the story presented as personal "truth." Accompanying them all with similar music, with images in the same surreal style, makes the line between fact and fantasy all the more difficult to determine.

An examination of these murder reenactments and other "witness" accounts gradually reveals a commonality amongst all those involved in the case: none appear to be emotionally invested with Wood's death, nor with whom is the real killer. They all seem emotionally distant from their stories, albeit for different reasons. The police do not care if they have the correct man in the case: they simply want a scapegoat. Frustrated by lack of leads in the case, Dallas law enforcement choose to believe the accusations of a juvenile delinquent with pending charges (who admitted to the crime to his friends) over the account of a never previously-arrested 28 year old, ostensibly—one of Adams's defense lawyers argues—because they can sentence an adult to death. The district attorney is obsessed with his win record, not wanting to lose a case. Adams recounts how the district attorney kept on talking about the electric chair: "He don't give a damn if you're innocent, don't give a damn is you're guilty—he's talking about killin ya." But it is not only the law-enforcement side that does not seem to care about the truth. Both Adams and his defense lawyers are fatalistic. One of his lawyers, losing faith in the system, gave up criminal law after the Adams case, saying, nearly deadpan, "if justice can miscarry so badly, I'd rather do something else." Adams himself seems to show little

emotion about the case: though still somewhat frustrated, he has resigned himself. Morris reveals that this quality is what had attracted him to the man, "Randall Adams fascinated me because of a kind of quality of acceptance about his speech; he's lived so long among people who tell him he's a liar that he's no longer even entirely sure he believes himself. In everything he says you feel this kind of ironic distance."[49]

The actual killer, David Harris, also shows an emotional detachment from the murder and his other crimes, though his is not fatalistic but an amoral, psychopathic remove. In Morris's final, tape-recorded interview with the criminal, Harris implies that Adams was convicted because he did not give Harris a place to stay the night of the murder, that it was somehow his fault. Earlier in the film, when recalling a drunken driving incident where he forced another vehicle off the road, Harris laughs and smiles at the recollection. His lack of personal responsibility, his detachment from his crimes, is furthered by testimony given by a Vidor policeman. The officer recounts Harris's murder of the boyfriend of a woman he was kidnapping. According to the policeman, Harris said that his victim deserved to die—that he was crazy—because he pulled a gun on Harris while trying to prevent his girlfriend's abduction.

The anempathy, the emotional remove of those involved in the case is most startling not in a murder reenactment, but in a rare instance where Morris uses Glass's music in an undoubtedly subjective, interpretive way: to cast doubt on one of the "eyewitnesses," Emily Miller. In the sequence at 48:34-50:00, Miller describes how as a

49 Errol Morris, "To Film Blue Murder: Errol Morris discusses his documentary *The Thin Blue Line* with Kevin Jackson," interview by Kevin Jackson, *The Independent* (London), 15 Mar 1989, Section Arts.

child, she always watched detective shows because she wanted to be one. Even now, she says while smiling, crime happens all around her: “everywhere I go, you know, there's killins.” To fulfill her childhood dream, she tries to beat the police to a solution, attempting to figure out the killer before they do. Morris is not content to let her own testimony condemn Miller—or the fact that she smiles while saying murders happen everywhere near her—but instead uses Glass's music and stock film clips to pointedly express his own incredulity toward the “witness.” A few seconds after she begins speaking, Morris inserts old black and white film footage of what appears to be a B-grade detective show, accompanied by very perky Glass music. The cue (48:40-50:00) is far faster than any of those of the reenactments; instead of their fairly consistent moderato (see Tempo, Example 7.18), this cue is an allegro M.M. 132. It is also distinct in instrumentation: all other cues in the film use primarily orchestral instruments: strings, woodwinds, and brass. This cue's most prominent motive is a low, bouncy synthesizer (Example 7.23)

Example 7.23: Bouncy synthesizer motive in Emily Miller detective cue (48:40-50:00)

Using this fast, perky, synthesized music with black and white B-movie film clips exposes Emily Miller; Morris reveals her to be an unreliable witness, as someone trying to live out a childhood fantasy. The fun, bouncy music reveals that hers is a twisted form of anempathy; she does not care about the true facts of the case, she does not consider the

fate of the real people involved. Instead of internalizing the seriousness of the situation, she simply wants reward money and to amuse herself playing detective.

So it is not simply the *music* of *The Thin Blue Line* that is anempathetic, indifferent to the death of Wood; instead, it performs an even more disturbing, sweeping function. It is horrifying, "cold, frightening," "gloriously menacing," "pointedly eerie," and "ominous" because, in conjunction with the images and witness testimony, it reveals a *real* dystopia: that those in the halls of justice are indifferent to truth, that they are corrupt. As Harris declares—turning its normal interpretation on its head—the statue of justice is blind; as the "witness" Michael Randell suggests, the "scales of justice are not balanced": "they already decided to do with you in the hall [of justice]... the scales are in the hall, and they go up and down. They might go up for you, favor one way, they might go down against ya. So if the DA wants you to hang 15 or 20 years, you're hung." But it is not simply the legal system does not seem to care what really occurred; the real criminal takes no responsibility for his actions, the "witnesses" prefabricate stories for money, and even the wrongly accused is fatalistic, with an "ironic distance" from what happened. It is because the music has the same indifference to the crime as the players involved that it evokes a sense of dread; the score emphasizes the dystopian anempathy of real people. It is by revealing this aloofness, both aurally and visually, that Morris moves his audience; it is not simply the *music*'s "very emotionlessness," but the *characters*' indifference, juxtaposed with the heinous miscarriage of justice, that

"provokes our emotional response."[50]

50 Gorbman, *Unheard Melodies*, 24.

CHAPTER EIGHT
CONCLUSION

8.1 Summary

Though they began in short avant garde films, minimalist scores are now "being heard all through the cineplexes of America."[1] This dissertation has examined this phenomenon from both a historical and analytical perspective, aiming to uncover minimalism's function in mass-market cinema. Chapter One described the musical technique, its characteristics, and how its attributes interact with the model of the traditional score. By tracing the use of the minimalism in cinema from its origins to the present (2008), Chapter Two revealed that the musical technique has become ubiquitous in mass media, deployed even by composers not usually considered minimalists. One possible reason for this trend is that minimalism has begun to acquire meanings, meanings that have the potential of becoming culturally encoded.

Chapter One outlined a methodology for teasing out these meanings by employing Nicholas Cook's idea of "enabling similarity." Using the concept that meanings are constrained or enabled by music's attributes—and assisted by Rebecca Leydon's list of potential meanings in "Toward a Typology of Minimalist Tropes"—Chapters Three through Seven provided case studies of ten films employing minimalist techniques that have become (or were intended to be) part of popular culture. Analyses of selected cues from these films suggest that minimalism has functioned in a number of ways: to mark

1 Koehler, "Less is More: Minimalist Music at Film Forefront."

alterity, the mathematical mind, and dystopia. In all cases examined, these functions are enabled by the musical cue's attributes.

In *Koyaanisqatsi, The Terminator*, and *A.I.*, minimalism or minimalist techniques serve as an iconic sign; the steady pulsed, repeating "motoric" motives of the music are onomatopoeically similar to the repeating, mechanical actions of the machines. The synthesizer instrumentation, the inhuman, mechanical precision of the rhythms, and the paucity of dynamic change mark a loss of subjectivity, an Other that lacks emotion and humanness. In *Solaris*, minimalism instead marks an alien that has some kind of subjectivity, but one unknowable by humans. Like the ambiguous meaning of the minimalist score—so different from the explicit signification of the dissonant cues that traditionally accompany the alien—the planet remains an enigma. Though deploying some conventional methods for expressing ethno-cultural alterity, *Kundun*'s minimalist score also has elements in common with the film's presentation of Tibetan culture: a "mantric" sense of cyclicism and timelessness. Glass's linkage of minimalism and Tibet also offers the possibility for it to function against both *chinoiserie* and traditional tonal music, for those styles to become minimalism's Other.

In *A Beautiful Mind* and *Proof*, the minimalist technique's motoric patterns and lack of Romantic emotional signifiers prove an enabling similarity with the mathematical thought process. A sense of entrapment is suggested by the music of *The Truman Show* and *Gattaca*, with the seemingly inescapable obsessive repetitions of the cues revealing their respective dystopian settings. And in *The Thin Blue Line*, minimalism is deployed anempathetically, with its lack of musical reaction to scenes of murder revealing a

dystopian realm where even those of the law do not care about justice.

Assessing the use of minimalism in these films, it seems that in many cases it functions in contrast to the conventional score. Often this is in opposition to the traditional function of film music as a "signifier of emotion." It is the lack of conventional emotional signifiers that allow it to be anempathetic in *The Thin Blue Line*; it is the change from minimalist to more Romantic music that marks the trajectory from mechanism to "boy" capable of emotional attachment in the mother's mind in *A.I.* In *A Beautiful Mind* and *Proof*, the music marking logical thought is minimalist, different from the more traditional cues used in these films to mark Romantic love or loss. The use of a minimalist/atmospheric score allows the music of *Solaris*—like the rest of the film—to remain enigmatic when compared to the classical Hollywood film score's explicitness. The opposition to the conventional score is more literal in *Kundun*, where minimalism/Tibet function in opposition to China/traditional tonal music. So although minimalism is a different musical idiom than the classical scoring style, it is in a sense dependent upon it; it is only against this model that it can serve as a foil.

8.2 Questions for Further Research

Although this dissertation has answered a number of questions about minimalism in film, many topics remain unexplored. Although minimalism has functioned as a marker of alterity, mathematical genius, and dystopia, have those meanings become enculturated? What, if any, other functions has minimalism served? How does the film work of these composers compare to their concert music?

The connections between minimalist music and specific meanings in film are contingent upon its musical attributes but are also socially constructed. Has that construction become reified; have the meanings described in this dissertation become enculturated? The conventions and meanings of the classical Hollywood score are encoded. The swelling of a lyrical string theme is automatically registered as "romance," while deep bass rumbles are read as portentous. These conventions arose over decades, migrating from opera to the mood and atmosphere music accompanying silent films to sound film scores. J. Peter Burkholder's article "A Simple Model for Associative Musical Meaning" suggests that a listener focuses on familiar elements in music, and these elements are then linked with associations dependent on where the listener previously heard these elements.[2] For the conventions of the traditional score to be enculturated, Western audiences must have become familiar with these codes through numerous encounters so that their associations have solidified; as Anahid Kassabian declares, "Audiences have simply seen enough films to know what "low, ominous sounds"... mean."[3] But has the film-going audience had enough encounters with minimalist scores for their meanings to have become encoded; have they become competent in these codes?

A shown in Chapter Six, the minimalist technique has been deployed at least twice in cinema as a marker for the mathematical thought process, with *A Beautiful Mind* reaching a wide audience. Its use for the machine has seen the three iterations discussed

2 Burkholder, "A Simple Model for Associative Musical Meaning," 78.
3 Anahid Kassabian, *Hearing Film: Tracking Identifications in Contemporary Hollywood Film Music* (New York: Routledge, 2001), 24.

in Chapter Three, plus the "Train to São Paulo" sequence in *Powaqqatsi*. But three or four instances are not enough to ensure an encoding; determining whether these particular meanings have become enculturated is a question for future work. Perhaps this can be answered through music cognition studies in the vein of Tagg and Clarida's TV theme semiotics/reception research, by testing if subjects make automatic connections between minimalist music and this dissertation's linked meanings.[4] This question can also be addressed through further examination of mass-market films with minimalist scores, seeing if the musical technique continues to be used in other films in the same ways, especially in newly-released films.

Future studies may also identify additional functions of minimalist scores. As Nicholas Cook postulates in "Theorizing Musical Meaning," meaning is constrained by musical attributes, but cultures may make different meanings dependent upon which attributes that culture selects.[5] Minimal music's characteristics allow for a wide range of potential meanings beyond those I have examined. In "Minima Romantica," Susan McClary suggests the meaning of unsatisfiable desire in films such as *The Hours*. Do other movies employing minimalism select the same attribute from the musical trace as McClary—the lack of real resolution—as the basis for their musical function? Though I linked film music to Leydon's motoric, mantric, and totalitarian tropes, have any films used minimalism in a maternal or aphasic manner? This study limited itself to English-language films; since, following Cook, other cultures may make different attribute

4 See Philip Tagg and Robert Clarida, *Ten Little Title Tunes* (New York and Montreal: Mass Media Music Scholars' Press, Inc., 2003). Study summarized in Kassabian, *Hearing Film*, 18-20.

5 Cook, "Theorizing Musical Meaning," 178-9.

selections and thus alternative meanings, European cinema should be examined to determine if the minimalist scores of composers such as Wim Mertens are used in a similar fashion.

Finally, though Chapter Two briefly mentioned the film careers of a number of minimalist composers, it barely scratched the surface of the work left to be done on this part of their oeuvres, especially that of Philip Glass and Michael Nyman. Though notated scores are rarely available, much of their film work is available on soundtrack recordings, recently from the composers' own labels. Due to their sheer volume, it would be impractical to examine in detail all of their scores; however, it would be valuable to explore the relationship between their film and concert music. Particularly illuminating would be a comparison of their musico-dramatic works, opera vs. film, to see how music and narrative interact in the different idioms. Over the years, as their scores have reached further into the mainstream, has their film music become more conventional than that of their operas?

It is common to speak of "art music" as influencing the music of popular culture. In film music studies, for instance, authors note that the concept of the leitmotif descended from opera to melodrama to the film scores of today. In this dissertation, I have also traced this path, showing how minimalism began to be employed in avant-garde films and has migrated to those of the mass market. But the use of the minimalist technique in cinema has now created an unusual loop, reversing the traditional relationship. The audience of a Philip Glass concert or opera is now more likely to come to his music through the lens of popular culture, from films such as *The Truman Show*

and *The Hours*. Thus this high cultural form's meaning is now determined outside of the concert hall. In reshaping popular culture through film, minimalism finds itself reshaped by it in turn.

APPENDIX A

Minimalism in Film Chronology: Reich, Riley, Glass, and Nyman

Table Key

Italicized Text	*Short film*
Underlined Text	Documentary
Bold Text	**Full-length fiction film**
&	Film with no dialogue (new film, not rescored older silent)
"Title in quotes"	Television episode or film
+	Selection of pre-composed/existing music only
*	More than one composer worked on film
#	New score for old film
^	Opera, concert, or stage work filmed
?	Conflicting/incomplete information
{Title in curly brackets}	Not minimalist Score?
[Title in brackets]	Never released?
(Title in parentheses)	Composer uncredited
~~Title Strikethrough~~	Score rejected, replaced with another's for final film (more of these likely exist, but are rarely mentioned)

Note: These symbols may be used in combination, so
***"Movie"** would be a full-length movie for TV with more than one composer

N.B. All appendix information was compiled from the sources referenced in this dissertation, the official websites of the composers, film databases including IMDB, All Movie Guide, *Variety*, and inbaseline.com, newspaper articles, library records, and the websites of the films and television shows mentioned. As I do not have access to all these films to verify this data firsthand, I cannot guarantee veracity, though all effort has been made to cross-check the data between these sources.

Year	Reich	Riley	Glass	Nyman
1963	*{Plastic Haircut}*			
1964				
1965	*{Oh Dem Watermelons, Thick Pucker}*			
1966			***{Chappaqua}**	?{*Tree*}
1967				
1968			Inquiring Nuns	

Year	Reich	Riley	Glass	Nyman
1969	**My Name is Oona*	+"Music with Balls"		
1970		*Corridor*, *{Straight and Narrow}*	Marco	
1971		***+Ça n'arrive qu'aux autres**	+*End of the Art World	
1972		**Les Yeux fermés**, *+Matrix III*		
1973		**+*La Chute d'un corps**		
1974		**Lifespan**, +*"Music with Roots in the Aether: Opera for Television by Robert Ashley"	+*"Music with Roots in the Aether: Opera for Television by Robert Ashley"	
1975				
1976		**Crossroads*		**{Keep It Up Downstairs},** *Goole by Numbers*
1977			North Star: Mark di Suvero	Tom Phillips
1978				*1-100, A Walk through H: The Reincarnation of an Ornithologist, *Vertical Features Remake*
1979			*& "Geometry of a Circle"*	
1980				**The Falls**, "*Act of God*"
1981				*Terence Conran*

Year	Reich	Riley	Glass	Nyman
1982	*?+La Espera*, *?+*El Aventon*			**The Draughtsman's Contract**, ***Brimstone and Treacle**
1983			&Koyaanisqatsi, ^"Satyagraha," +*(**Breathless**), *A Gentleman's Honor*, *Act III*, +"Four American Composers: Philip Glass"	**"Nelly's Version,"** Frozen Music, The Coastline
1984			"*High Wire*," *The Box Theory*	"**The Cold Room**," "Fairly Secret Army," *Making a Splash*
1985		**No Man's Land (Niemandsland)**	**Mishima: A Life in Four Chapters**	**A Zed and Two Noughts,** *The Kiss*, *Inside Rooms: 26 Bathrooms, London & Oxfordshire*, ?*L'Ange frénétique*
1986			^*Dead End Kids, ?*Dialogue,* *The Kitchen Presents Two Moon July	"**The Disputation**," I'll Stake My Cremona to a Jew's Trump, #*Ballet Méchanique*
1987			***Hamburger Hill**, +^*It's Clean It Just Looks Dirty	***Le Miraculé**, ^The Man Who Mistook His Wife for a Hat, ?+*"Arsenal Atlas: Canton: Fens, yuans i renminbis," ?+*"Arsenal Atlas:

Year	Reich	Riley	Glass	Nyman
				Shangai: Sin nuan hao"
1988			&Powaqqatsi, The Thin Blue Line	**Drowning by Numbers**, *"Death in the Seine*," *Fear of Drowning*
1989			+***La Chiesa,** ^*?"Timeless Voices: The Gyuto Monks," +*Architecture of Transcendence*	**Monsieur Hire, The Cook The Thief His Wife & Her Lover**, "Out of the Ruins," *Hubert Bals Handshake*
1990			**Mindwalk**, +*Christo in Paris, *Sea of Oil: Valdez after the Spill,* "Nova: ConFusion in a Jar"	**Les Enfants Volants**, **Le Mari de la coiffeuse**, "Men of Steel"
1991	*+**Árnyék a havon**	+*Pictures from a Revolution	**?*Closet Land**, +***Merci la Vie**, A Brief History of Time, "A Walk Through Prospero's Library," +***Exposure**	**Prospero's Books**, *"**Not Mozart: Letters, Riddles and Writs**," ?*Ich war ein glücklicher Mensch
1992			*?Privé de vieillesse*, "Last Frontiers: The Arctic," &*Anima Mundi*, ?*+**Planetens spejle**, **Candyman**	+The Michael Nyman Songbook, "*The Final Score*," ^"The Fall of Icarus"
1993			Compassion in Exile	**The Piano,** +*"Iron Chef"
1994			*La Mort de Molière,* "Last	***Mesmer, A La Folie /Six Days Six**

Year	Reich	Riley	Glass	Nyman
			Frontiers: The Himalayas," +^"Twila Tharp: Oppositions," +*Niki de Saint Phalle: Wer ist das Monster-du oder ich?	**Nights**
1995			*?Impetus Apaches*, **Candyman II: Farewell to the Flesh**, "Journey to Enlightenment," **Jenipapo,** "American Masters: Edgar Allan Poe: Terror of the Soul," *Evidence*	**Carrington, Anne no nikki**
1996		*#+Looking for Mushrooms*	*?Départ immédiat*, ?+*Absence Stronger Than Presence,* **The Secret Agent**	**Der Unhold**
1997			**Bent**, ******Ballad of the Skeletons*, **Kundun**, ?#Cenere, +*Seeds of Tibet: Voices of Children in Exile*	**Gattaca, ****Anzar*
1998			?*Fast Track*, ***The Truman Show, *+Si Je T'aime....Prends Garde A Toi, "**Chuck Close: A Portrait in	"Titch," ~~**Practical Magie**~~

Year	Reich	Riley	Glass	Nyman
			Progress"	
1999			*?+Sin ceder*, *"The Source," ?+***The Eden Myth**, #Dracula	***Ravenous, Wonderland, *Nabbie no koi, The End of the Affair**
2000		*+Jag minns Lena Svedberg*	*Armonie dell'Estasi*, +The Video Diary of Ricardo Lopez, +*Condo Painting, +*One Day in September	**The Claim**, "*Act without Words I*," *That Sinking Feeling,* **+*Purely Belter**
2001			(+*The Confession*), *Diaspora*, *The Man in the Bath*, *Passage, Notes,* +***Le Pornographe**, *+"Haj med luftpost," "Legacy of a Kidnapping: Lindbergh and the Triumph of the Tabloids"	*+**La Stanza del figlio**, **Haute fidélité*,**Subterrain*
2002	*+Hold On*		&Naqoyqatsi, **The Baroness and the Pig**, *+**C'est le bouquet!**, **The Hours**	**24 heures de la vie d'une femme, #The Man with a Movie Camera, ~~The Hours~~**
2003			+***My Father Rua Alguem 5555**, The Fog of War, +"Pandemic: Facing AIDS," +*À hauteur d'homme, **+*Les**	+*"*On the Trail of John Hunt Morgan,*" **The Actors, Nathalie..., [Charged: The Life of Nikola Tesla/Tesla and**

Year	Reich	Riley	Glass	Nyman
			Invasions Barbares, ?+Oracles and Demons of Ladakh, +*"Six Feet Under: Timing and Space"	**Katherine]**
2004	*?+Placer=Amor*, *+Indecision*		*Aztec Legend*, ***Secret Window**, ***Taking Lives**, ***Undertow**, **+*Declaring Genius*, *+**Yes**, Going Upriver: The Long War of John Kerry	**The Libertine, *Luminal**
2005	*?*Sobre-rieles*, +***The Dying Gaul**, *+"Betty Freeman: A Life for the Unknown," +Refuge, +*"Holocaust: A Music Memorial Film"		**+La Moustache**, *+*"Battlestar Galactica: Valley of Darkness," *Disparait v*, &**Faith's Corner**, **NeverWas**, *?+The Giant Buddhas, *Nasiona*, *+"*Abused*," *+**The Loss,* +*"Independent Lens: Enron: The Smartest Guys in the Room," "Night Stalker"	Detroit: Ruin of a City, *+**A Cock and Bull Story**, **Jestem**, **Close to Greenaway,* **+*9 Songs**
2006			**Roving Mars*, *El Drama de la memoria*, (*+"Scrubs: My Chopped Liver"), **The Illusionist,** *Taiji: Chaotic Harmony,* **Notes**	

Year	Reich	Riley	Glass	Nyman
			on a Scandal, ?+*"UFO Files: Black Box UFO Secrets," ?*The Shoemaker,* *+A Crude Awakening: The Oil Crash	
2007			***No Reservations, Les Animaux Amoureux, ~~The Reaping~~**	**Never Forever, *?+Teresa el cuerpo de Cristo**
2008			**Cassandra's Dream**	**Genova**

APPENDIX B

Minimalism in Film Chronology: Selected Other Minimalists in Film

This appendix includes "art music" composers not included in the body of this dissertation, but whose work also falls into the minimalist vein: Wim Mertens, Louis Andriessen, John Adams, Arvo Pärt, Henryk Górecki, and John Tavener.[1]

Table Key: Same as Appendix A

	Mertens	Andriessen	Adams	Pärt	Górecki	Tavener
1973		?{**The Family**}				
1974						
1975						
1976						
1977		?De Plaats van de vreem-deling				
1978			?"Tart-uffe"			
1979						
1980						
1981						
1982		**Golven/ Waves**				
1983		+De Tijd				
1984						
1985					**+*Police**	
1986						
1987	***The Belly of**			+**Rachel**		

1 I am referring here to what are known as "art music" minimalist composers, those considered part of the classical music establishment. Some might question the inclusion of the "holy minimalists" here, as they have aesthetic and stylistic differences from minimalists such as Glass and Nyman. They were included here for the sake of completeness.

	an Architect			**River**		
1988						
1989						
1990	?Rust			+*"Guns: A Day in the Death of America"	+*"Omnibus: Van Gogh"	
1991	*En Paz*	*"M Is for Man, Music, Mozart"*	**+The Cabinet of Dr. Ramirez**	**+*Les Amants du Pont-Neuf**		
1992	*Servaisgraph-ia,* ***Je pense à vous***					
1993	**#La femme de nulle part, #The land beyond the sunset**				**+*Fearless**	
1994						
1995	+**Between the Devil and the Deep Blue Sea /Li,**				**+*Kristin Lavrans-datter**	
1996	**Fiesta**			**+*Mother Night**	**+*Basquiat**	
1997	+***Winter-schläfer**			**+*Winter-schläfer**		
1998	*Nós Que Aqui Estamos por Vós Esperamos, *?Claudia*			**+*The Thin Red Line**	***?Michel, le magistère du corps***	
1999	Entre Flore et Thalie, **Molo-kai: The Story of Father**	^"The Death of a Composer: Rosa, a Horse	"The 20th Century: An/The American Tapestry"	**?**+*The Insider		

	Damien	Drama”				
2000	?Raveel - An Interaction Between Art & Architecture, **+* De Zee die denkt**	*The New Math(s)*				***“Gormenghast”**
2001	**?Qui vive**			**+*Bella Martha, +*”Wit”**	+*Unfinished Symphony: Democracy and Dissent,+*”**Wit**”	*Pilgrimage*
2002			**+*L'Ora di religione**	**+*Heaven, +*Swept Away**	+*Gambling, Gods, and LSD, +*Enquête sur le monde invisible	**+*L'Ora di religione**
2003	1,99 - Um Supermercado Que Vende Palavras			**+*Les Invasions barbares**		
2004				+*Fahrenheit 9/11		
2005	Le Silence des rizières				+*“Holocaust: A Music Memorial Film”	**?Batalla en el cielo**
2006	**Der Lebensversicherer**				*+*Absorbido*	***Children of Men**
2007	**Erfgenaam van Elsschot**, **Otavio e as letras**					

APPENDIX C

Minimalism in Film Chronology: "Non-Minimalist" Composers

These films all reportedly use minimalist techniques in at least part of their scores.

Table Key: Same as Appendix A.

1984	**The Terminator**—score composed by Brad Fiedel
.....	
1995	**Angels and Insects—**Alexander Balanescu (associate of Michael Nyman)[1]
1996	**Kama Sutra: A Tale of Love—**Mychael Danna **Lilies—**Mychael Danna
1997	Fast, Cheap and Out of Control—Caleb Sampson **The Sweet Hereafter—**Mychael Danna **The Ice Storm—**Mychael Danna[2]
1998	
1999	**American Beauty**—Thomas Newman
2000	
2001	**A Beautiful Mind**—James Horner **A. I.: Artificial Intelligence**—John Williams
2002	**Minority Report**—John Williams **Solaris**—Cliff Martinez
2003	
2004	
2005	**Proof**—Stephen Warbeck
2006	
2007	"Dogs that Changed the World: The Rise of the Dog"—Max Reud and Kris Zooki
2008	"American Experience: Grand Central"—Joel Goodman

1 Minimalist according to Susan McClary, "Minima Romantica," in *Beyond the Soundtrack: Representing Music in Cinema*, eds. Daniel Goldmark, Lawrence Kramer, and Richard Leppert (Berkeley: University of California Press, 2007).

2 These 1996 and 1997 films have minimalist aspects according to Robert Koehler, "Less is More: Minimalist music at film forefront," *Daily Variety*, 22 Jan 1998.

GLOSSARY

Avant-garde/Experimental Film: Avant-garde film experiments with the cinematic medium, consciously using techniques (like fast cutting, odd camera angles, distortion, time lapse) that draw attention to the medium; it may be non-linear and non-narrative, and its often ambiguous meaning forces the viewer to construct their own.[1]

Arthouse/Art Film: Arthouse film is intended for a niche—not mass—audience because of artistry or content; it may have a recognizable authorial voice, narrative gaps, ambiguity, and be less plot-driven than commercial film, and may feature "psychologically complex characters" (e.g., 2006's *Pan's Labyrinth*).[2]

Diegetic Music: Diegetic music is understood as emanating from some source within the realm portrayed on screen. Characters in the film can hear this music, and its source may be explicitly shown, e.g., with the image of a radio.[3]

Documentary: Though it may not be reliable, a documentary "purports to present factual information about the world outside the film" (2006's *An Inconvenient Truth*).[4]

---

1 David Bordwell and Kristin Thompson, *Film Art: An Introduction*, 5th ed. (New York: The McGraw-Hill Companies, 1997), 50-1.
2 David Bordwell, "The Art Cinema as a Mode of Film Practice," *Film Criticism* 4, no. 1 (Fall 1979): 56-63.
3 Gorbman, *Unheard Melodies*, 22.
4 Bordwell and Thompson, *Film Art*, 42-45.

Independent Film: An independent film is produced without monetary backing from a major studio, though it may get a distribution deal through one; its connotation is for a film with a lower budget. It may be arthouse or may be intended to gain a wide audience (such as 2006's *The Illusionist*).

Nondiegetic Music: Sometimes called "background music," nondiegetic music is not from the world portrayed in the film—the film's audience can hear it, but the film's characters cannot ("The Imperial March," *Star Wars* V and VI).

Studio Film: A studio film is monetarily backed by a major film studio, and intended for wide audience appeal.

Temp (Temporary) Track: A temporary track is pre-existing music used with a film before new music is composed specifically for it. The temp track may suggest a musical style for a scene, and often the new score ends up sounding similar (e.g., fight scenes in sci-fiction and fantasy films often sound suspiciously like *Carmina Burana*, with big orchestra and choir).

SELECTED BIBLIOGRAPY

Abramson, Marc. "*Kundun* and *Seven Years in Tibet*." *Cineaste* 23, no. 3 (April 1998): 8-12.

Anderson, Gillian B., Thomas L. Riis, and Ronald H. Sadoff. "Introduction." *American Music* 22, no. 1 (Spring 2004): 1-13.

Antokoletz, Elliott. *Twentieth-Century Music*. Upper Saddle River: Prentice Hall, Inc., 1998.

Barlow, Priscilla. "Surreal Symphonies: *L'Age d'or* and the Discreet Charms of Classical Music." In *Soundtrack Available: Essays on Film and Popular Music*, edited by Pamela Robertson Wojcik and Arthur Knight, 31-52. Durham: Duke University Press, 2001.

Bazelon, Irwin. *Knowing the Score: Notes on Film* Music. New York: Van Nostrand Reinhold Company, 1975.

Bernard, Jonathan W. "Minimalism, Postminimalism, and the Resurgence of Tonality in Recent American Music." *American Music* 21, no. 1 (Spring 2003): 112-133.

_____. "Minimalist Aesthetic in the Plastic Arts and Music." *Perspectives of New Music* 31, no. 1(Winter 1993): 86-132.

Bishop, Peter. *The Myth of Shangri-La: Tibet, Travel Writing, and the Western Creating of a Sacred Landscape*. London: Athlone, 1989.

Bodien, Earl. "The Films of Robert Nelson." *Film Quarterly* 20, no. 3 (Spring 1967): 50-52.

Bordwell, David. "The Art Cinema as a Mode of Film Practice." *Film Criticism* 4, no. 1 (Fall 1979): 56-63.

Bordwell, David and Kristin Thompson. *Film Art: An Introduction*, 5th ed. New York: The McGraw-Hill Companies, 1997.

Born, Georgina and David Hesmonghalgh, eds. *Western Music and Its Others: Difference, Representation, and Appropriation in Music.* Berkeley: University of California Press, 2000.

Bourdieu, Pierre. *The Field of Cultural Production: Essays on Art and Literature.*

Edited by Randal Johnson. New York: Columbia University Press, 1993.

Broad, Elaine. "A New X? An Examination of the Aesthetic Foundations of Early Minimalism." *Music Research Forum* 5 (1990): 51-62.

Brown, Kristi. "Perfectly Executed: Bach's Music, Technology, and Violence in Film." Abstract in *AMS/SMT Columbus 2002 Abstracts,* 98. http://www.ams-net.org/Abstracts/2002-Columbus.pdf (accessed 18 July 2007).

Brown, Royal S. *Overtones and Undertones: Reading Film* Music. Berkeley and L.A.: University of California Press, 1994.

Brownrigg, Mark. "Hearing Place: Film Music, Geography, and Ethnicity." *International Journal of Media and Cultural Politics* 3, no. 3 (2007): 307-323.

Buhler, James, Caryl Flinn, and David Neumeyer, eds. *Music and Cinema.* Hanover: Wesleyan/University Press of New England, 2000.

Buhler, James and David Neumeyer. "Film Studies/Film Music." *Journal of the American Musicological Society* 47, no. 2 (Summer 1994): 364-385.

Burk, Greg. "Droning Man." *LA Weekly*, 3 October 2003. http://www.laweekly.com/music/music/droning-man/2346/ (accessed 3 January 2008).

Burkholder, J. Peter. "A Simple Model of Associative Musical Meaning." In *Approaches to Meaning in Music*, edited by Byron Almén and Edward Pearsall, 76-106. Bloomington and Indianapolis: Indiana University Press, 2006.

Burlingame, Jon. "Carefully, Glass goes Hollywood; The often controversial composer says he's choosy when it comes to film work. Over the decades he's amassed an impressive body of work. 'The Hours' is his latest." *Los Angeles Times*, 22 December 2002, Section E.

Butler, David. "The Days Do Not End: Film Music, Time, and Bernard Herrman." *Film Studies* 9 (Winter 2006): 51-63.

Castle, Robert. "*The Truman Show*'s Sociology: The Show Must Go On." *Bright Lights Film Journal* 49 (August 2005). http://www.brightlightsfilm.com/49/truman.htm (accessed 19 September 2007).

Cohn, Richard L. "Transpositional Combination of Beat Class Sets in Steve Reich's Phase-shifting Music." *Perspectives of New Music* 30, no. 2 (Summer 1992):

146-177.

Collins, Karen. "I'll be back: Recurrent Sonic Motifs in James Cameron's Terminator Films." In *Off the Planet: Music, Sound and Science Fiction Cinema*, edited by Philip Hayward, 165-175. Bloomington: Indiana University Press, 2004.

Comerford, Jason. "The Best (& the Worst) of 2002: Six Things I've Realized about Film Music: 2002 in Review," *Film Score Monthly* 8, no. 1 (January 2003): 22-23. http://www.filmscoremonthly.com/articles/2003/19_Feb-Jason_Comerford_2002_In_Review.asp (accessed 1 July 2007).

Cook, Nicholas. *Analysing Musical Multimedia.* Oxford: Clarendon Press, 1998.

_____. "Theorizing Musical Meaning." *Music Theory Spectrum* 23, no. 2 (2001): 170-195.

Cooke, Mervyn. "Film Music." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 1 February 2007).

Corbett, John. "Experimental Oriental: New Music and Other Others." In *Western Music and Its Others: Difference, Representation, and Appropriation in Music*, edited by Georgina Born and David Hesmondhalgh, 163-186. Berkeley: University of California Press, 2000,

Cotter, Jim. "Steve Reich." In *Music of the Twentieth-Century Avant-Garde: A Biocritical Sourcebook*, edited by Larry Sitsky, 385-390. Westport: Greenwood Press, 2002.

Cowley, Julian. "Terry Riley: Happy Endings." *Wire: Adventures in Modern Music* 278 (April 2007). http://www.thewire.co.uk/articles/163/ (accessed 1 January 2008).

Daughherty, Florence Anne Millard. "Narrative and Nonnarrative Structures in the Film Music of Michael Nyman." Ph.D. diss., Florida State University, 1997.

Davidson, Annette. *Hollywood Theory, Non-Hollywood Practice: Cinema Soundtracks in the 1980s and 1990s.* Burlington: Ashgate Publishing Company, 2004.

Davis, R. G. *The San Francisco Mime Troupe: The First Ten Years.* Palo Alto: Ramparts Press, 1975.

Dempsey, Michael. "Qatsi means Life: The Films of Godfrey Reggio." *Film Quarterly* 42, no. 3 (Spring 1989): 2-12.

Diehl, Keila. *Echoes from Dharamsala: Music in the Life of a Tibetan Refugee Community.* Berkeley: University of California Press, 2002.

Dixon, Wheeler Winston. *The Exploding Eye: 1960s American Experimental Cinema.* Albany: State University of New York Press, 1997. NetLibrary. http://www.netlibrary.com.content.lib.utexas.edu:2048/ (accessed 3 September 2006).

Donnelly, K.J., ed. *Film Music: Critical Approaches.* New York: Continuum International Publishing Group, 2001.

Ellis, William. "A Chat with Michael Nyman." *American Record Guide* 60, no. 2 (1 March 1997): 32-34.

"Filmography." Michael Nyman Official Website. http://www.michaelnyman.com/filmography.php (accessed 3 Jan 2008).

Fink, Robert. "Arrows of Desire: Long-Range Linear Structure and the Transformation of Musical Energy." Ph.D. diss., University of California at Berkeley, 1994.

_____. *Repeating Ourselves: American Minimal Music as Cultural Practice.* Berkeley: University of California Press, 2005.

Flinn, Caryl. *Strains of Utopia: Gender, Nostalgia, and Hollywood Film Music.* Princeton: Princeton University Press, 1992.

Gann, Kyle. "Minimal Music, Maximal Impact: Minimalism Bibliography." NewMusicBox, 1 November 2001. http://www.newmusicbox.org/page.nmbx?id=31tp08 (accessed 9 January 2007.

_____. "Minimal Music, Maximal Impact, Minimalism's Immediate Legacy: Postminimalism." NewMusicBox, 1 November 2001. http://www.newmusicbox.org/page.nmbx?id=31tp05 (accessed 23 January 2007).

_____. "Minimal Music, Maximal Impact: Thankless Attempts at a Definition of Minimalism." NewMusicBox, 1 November 2001. http://newmusicbox.org/article.nmbx?id=1521 (accessed 29 Jan 2007).

Gans, Herbert J. *Popular Culture and High Culture: An Analysis and Evaluation of Taste,* Revised and Updated Edition. New York: Basic Books, 1999.

Glass, Philip. "A Reflection, Like the Moon on the Water: Philip Glass on *Kundun.*"

Interview by David Morgan. In *Knowing the Score: Film Composers Talk About the Art, Craft, Blood, Sweat and Tears of Writing for Cinema*, 238-243. New York: HarperCollins Publishers, 2000.

_____. *Music by Philip Glass.* New York: Dunvagen Music Publishers, 1987.

Glass, Philip. "Philip Glass on Composing for Film and Other Forms: The Case of *Koyaanisqatsi* (1990)." Interview by Charles Merrell Berg. In *Writings on Glass: Essays, Interviews, Criticism*, edited by Richard Kostelanetz, 131-151. New York: Schirmer Books, 1997.

Glaessner, Verina. "Keep it up Downstairs." *Monthly Film Bulletin* 43, no. 504/515 (1976): 102.

Gillespie, Don C. "Duckworth, William (Irvin)." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 26 Jan 2007).

Goldmark, Daniel, Lawrence Kramer, and Richard Leppert, eds. *Beyond the Soundtrack: Representing Music in Cinema.* Berkeley and Los Angeles: University of California Press, 2007.

Gorbman, Claudia. "Scoring the Indian: Music in the Liberal Western." In *Western Music and Its Others: Difference, Representation, and Appropriation in Music*, edited by Georgina Born and David Hesmondhalgh, 234-253. Berkeley: University of California Press, 2000.

_____. "The State of Film Music Criticism." *Cineaste* 21, no. 1-2 (Feb 1995): 72-5.

_____. *Unheard Melodies: Narrative Film Music.* Bloomington: University of Indiana Press, 1987.

Gottwald, Clytus. "Signale zwischen Exotik und Industrie, Steve Reich auf der Suche nach einer neuen Identität von Klang und Struktur." *Melos/Neue Zeitschrift für Musik* 1, no. 1 (1975): 3-6.

Griffiths, Paul. "Reich, Steve." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 17 Jan 2007).

Hacker, Jonathan and David Price. *Take Ten: Contemporary British Film Directors.* New York: Oxford University Press, 1991.

Hayward, Philip, ed. *Off the Planet: Music, Sound and Science Fiction Cinema.* Bloomington: Indiana University Press, 2004.

Hayward, Philip. "Sci Fidelity—Music, Sound, and Genre History." In *Off the Planet: Music, Sound and Science Fiction Cinema*, ed. Philip Hayward, 1-29. Bloomington: Indiana University Press, 2004.

Heisinger, Brent. "American Minimalism in the 1980s." *American Music* 7, no. 4 (Winter 1989): 430-47.

Hoek, D.J. *Steve Reich: A Bio-Bibliography.* Westport: Greenwood Press, 2002.

Johnson, Timothy A. "Minimalism: Aesthetic, Style, or Technique?" *The Musical Quarterly* 78, no. 4 (Winter 1994): 742-773.

Kalinak, Kathryn. *Settling the Score: Music and the Classical Hollywood Film.* Madison: The University of Wisconsin Press, 1992.

Kassabian, Anahid. *Hearing Film: Tracking Identifications in Contemporary Hollywood Film Music.* New York: Routledge, 2001.

Keesey, Douglas. *The Films of Peter Greenaway: Sex, Death, and Provocation.* Jefferson: McFarland & Company, Inc., 2006.

Koehler, Robert. "Less is More: Minimalist music at film forefront." *Daily Variety*, 22 Jan 1998.

Kutschke, Beate. "Avantgarde-Musik der USA aus bundesdeutscher Sicht um 1970: Personalism versus Subjektphilosophie." *Archiv für Musikwissenschaft* 61, no. 4 (2004): 275-299.

Lack, Russell. *Twenty-Four Frames Under: A Buried History of Film Music.* London: Quartet Books, 1997.

Lawrence, Amy. *The Films of Peter Greenaway.* New York: Cambridge University Press, 1997.

Leydon, Rebecca. "Toward a Typology of Minimalist Tropes." *Music Theory Online* 8, no. 4 (Dec 2002). http://mto.societymusictheory.org/issues/mto.02.8.4/toc.8.4.html (accessed 10 Jan 2007).

MacDonald, Scott. *A Critical Cinema: Interviews with Independent Filmmakers.* Berkeley: University of California Press, 1988.

_____. *A Critical Cinema 2: Interviews with Independent Filmmakers.* Berkeley: University of California Press, 1992. NetLibrary, http://www.netlibrary.com.content.lib.utexas.edu:2048/ (accessed 4 Dec 2006).

Mason, Susan Vaneta. *The San Francisco Mime Troupe Reader.* Ann Arbor: The University of Michigan Press, 2005.

McClary, Susan. "Minima Romantica." In *Beyond the Soundtrack: Representing Music in Cinema*, edsited by Daniel Goldmark, Lawrence Kramer, and Richard Leppert, 48-65. Berkeley: University of California Press, 2007.

Mertens, Wim. *American Minimal Music: La Monte Young, Terry Riley, Steve Reich, Philip Glass.* Translated by J(.) Hautekiet. London : Kahn & Averill; New York: Alexander Broude, 1983.

Monelle, Raymond. *Linguistics and Semiotics in Music.* Philadelphia: Harwood Academic Publishers GmbH, 1992.

Morgan, David, ed. *Knowing the Score: Film Composers Talk About the Art, Craft, Blood, Sweat and Tears of Writing for Cinema.* New York: HarperCollins Publishers, 2000.

Morris, Errol. "Beyond the Camera: Errol Morris Interview." Interview by William Phillips. Conducted 20 Mar 1998. "Film: An Introduction." http://www.bedfordstmartins.com/phillips-film-1e/morris1.htm (accessed 26 Sept 2006).

_____. "The Legendary Errol Morris Comes Out from Behind THE FOG OF WAR for Film Freak Central." Interview by Walter Chaw. http://filmfreakcentral.net/notes/emorrisinterview.htm (accessed 1 Nov 2007).

_____. "Making History: Errol Morris, Robert McNamara, and The Fog of War." Interview with Tom Ryan. *Senses of Cinema* (March 2004). http://www.sensesofcinema.com/contents/04/31/errol_morris_interview.html (accessed 26 Sept, 2006).

Nelson, Robert. "We were bent on having a good time: An Interview with Robert Nelson." Interview with Scott MacDonald. *Afterimage* (Summer 1983): 39-41.

Nicholls, David. "Transethnicism and the American Experimental Tradition." *The Musical Quarterly* 80, no. 4 (1990): 569-94.

Nyman, Michael. *Experimental Music: Cage and Beyond*, 2d ed. Cambridge:

Cambridge University Press, 1999.

_____. "Interview: The Practically Ravenous Michael Nyman." Interview by Dan Goldwasser. SoundtrackNet: The Art of Film and Television Music. 16 Mar 2000. http://www.soundtrack.net/features/article/?id=53 (accessed 1 Nov 2006).

_____. "Music and Film: An Interview with Michael Nyman." Interview by Larry Simon. *Millenium Film Journal* 10/11 (1981-82): 223-34.

Orledge, Robert. "Satie, Erik." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007).

Paddison, Max. Review of *American Minimal Music*, by Wim Mertens. *Tempo* New Series 148 (Mar 1984): 49-50.

Potter, Keith. *Four Musical Minimalists: La Monte Young, Terry Riley, Steve Reich, Philip Glass.* New York: Cambridge University Press, 2000.

_____. "Minimalism." *Grove Music Online*. Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 18 Jan 2007).

Prendergast, Mark. "The Nyman Factor." *New Statesman & Society* 8, no. 347 (7 Apr 1995): 48.

Prendergast, Roy M. *Film Music: A Neglected Art,* 2nd ed. New York: Norton, 1992.

Rabiger, Michael. *Directing the Documentary*, 4th ed. Burlington: Focal Press, 2004.

Reich, Steve. "Steve Reich: An Interview with Michael Nyman." Interview by Michael Nyman. *Musical Times* 112, no. 1537 (Mar 1971): 229-231.

_____. *Writings about Music.* Edited by Kaspar Koenig. Halifax: Nova Scotia College of Art and Design/New York: New York University Press, 1974.

_____. *Writings on Music: 1965-2000.* Edited by Paul Hillier. New York: Oxford University Press, 2002.

Ross, Alex. "Sound and Vision: Glass's 'Koyaanisqatsi' and the Art of Film Scoring." *New Yorker* 81 no. 18 (27 Jun 2005): 102-4.

Russell, Mark and James Young, eds. *Film Music.* Screencraft. Boston: Focal Press, 2000.

Scheurer, Timothy E. "The Score for *2001: A Space Odyssey.*" *Journal of Popular Film and Television* 25, no. 4 (Winter 1998): 172-183.

Schwartz, Elliott and Daniel Godfrey. *Music Since 1945: Issues, Materials, and Literature.* Belmont: Wadsworth/Thomson Learning, 1993:

Schwarz, K. Robert. *Minimalists.* London: Phaidon Press Limited, 1996.

Sheppard, W. Anthony. "The Exotic Enemy: Anti-Japanese Musical Propaganda in World War II Hollywood." *Journal of the American Musicological Society* 54, no. 2 (2001): 303-357.

Siôn, Pwyll ap. "Michael Nyman." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Oct 2006).

_____. *The Music of Michael Nyman: Texts, Contexts and Intertexts.* Aldershot: Ashgate Publishing, 2007.

Sitney, P. Adams. *Visionary Film: The American Avant Garde 1943-2000*, 3rd ed. New York: Oxford University Press, 2002.

Smith, Jeff. *The Sounds of Commerce: Marketing Popular Film Music.* New York: Columbia University Press, 1998.

Speller, Katherine. "Cinema Vérité: Defining the Moment." *Senses of Cinema* 11 (Dec 2000-Jan 2001). http://www.sensesofcinema.com/contents/00/11/verite.html (accessed 20 Oct 2007).

Stilwell, Robynn J. "Music in Films: A Critical Review of the Literature, 1980-1996." *Journal of Film Music* 1, no. 1 (2002): 19-61.

Strickland, Edward. "Glass, Philip." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 18 Jan 2007).

_____. *Minimalism: Origins* (Bloomington: Indiana University Press, 1993).

_____. "Riley, Terry." *Grove Music Online.* Edited by L. Macy, http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007).

_____. "Young, La Monte." *Grove Music Online.* Edited by L. Macy. http://www.grovemusic.com.content.lib.utexas.edu:2048 (accessed 12 Jan 2007).

Tagg, Philip. *Introductory Notes to the Semiotics of Music*, v. 3.2 (2000).

http://www.tagg.org/xpdfs/semiotug.pdf (accessed 7 Nov 2007).

Tarasti, Eero. *Signs of Music: A Guide to Musical Semiotics.* Berlin and New York: Mouton de Gruyter, 2002.

Tiomkin, Dimitri. "Composing for Films" (1951). In *Film Music: From Violins to Video,* edited by James L. Limbacher, 60. Metuchen: Scarecrow Press, 1974.

Whitney, John. *Digital Harmony: On the Complementarity of Music and Visual Art.* Peterborough: Byte Books, 1980.

Williams, Linda. "Mirrors without Memories: Truth, History, and the New Documentary." *Film Quarterly* 46, no. 3 (Spring 1993): 9-21.

Willoquet-Maricondi, Paula and Mary Alemany-Galway, eds. *Peter Greenaway's Postmodern/Poststructuralist Cinema.* Lanham: Scarecrow Press, 2001.

Youngblood, Gene. *Expanded Cinema.* New York: Dutton, 1970. Also available online at http://www.ubu.com/historical/youngblood/youngblood.html.

VITA

Rebecca Marie Doran Eaton attended Searcy High School, Searcy, Arkansas. After graduating in 1997, she attended Harding University, also in Searcy, Arkansas. She spent a semester at Harding's program in Athens, Greece, in fall 1998, then received a Bachelor of Arts in music from Harding University in May 2001. She moved to Louisville, Kentucky in fall 2001 to attend the University of Louisville, where she studied composition under Dr. Marc Satterwhite. She taught freshman music theory and ear training for a year, and completed her M.M. in Music Composition in May 2003. In August 2003 she entered the music theory Ph.D. program at The University of Texas at Austin, where she taught undergraduate music theory and ear training for three years.

Permanent Address: 3305 Silkgrass Bend, Austin, Texas 78748

This dissertation was typed by the author.